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WEATHER AS THE DECISIVE FACTOR OF THE
ALEUTIAN CAMPAIGN, JUNE 1942-AUGUST 1943

A thesis presented to the Faculty of the U.S. Army
Command and General Staff College in partial
fulfillment of the requirements for the
degree

MASTER OF MILITARY ART AND SCIENCE

by

CAROL A. WILDER, LCDR, USN
B.S., Drake University, Des Moines, Iowa, 1983

Fort Leavenworth, Kansas
1993

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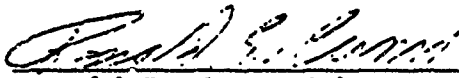
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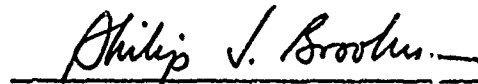
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The opinions and conclusions expressed herein are those of the student author and do not necessarily represent the views of the U.S. Army Command and General Staff College or any other governmental agency. (References to this study should include the foregoing statement.)

ABSTRACT

WEATHER AS THE DECISIVE FACTOR OF THE ALEUTIAN CAMPAIGN,
JUNE 1942-AUGUST 1943 by Lieutenant Commander Carol A.
Wilder, USN, 118 pages.

This study is an examination of historical data to determine if weather was the decisive factor of the Aleutian Campaign. The campaign was carried out early in World War II along the over 1,000 miles of the archipelago. Island warfare made joint operations a necessity. Weather conditions disrupted all areas of battle; sea, air and ground, and made attempts at coordinated actions futile.

The intense weather conditions of the North Pacific severely complicated operations over, near and on the Aleutian Islands. Weather and its effect on the Japanese raid on Dutch Harbor and the American response is examined. The role of the weather is also examined as the Americans attempt to bomb the Japanese out of Kiska and Attu. Finally, the influence of weather on the amphibious landings and ensuing ground action to eject the Japanese from the islands is reviewed.

Though a dominant factor, weather was not the decisive factor at the tactical level of warfare during this campaign. The American ability to mass overwhelming combat power ultimately drove the Japanese from the region.

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CHAPTER 1

INTRODUCTION

The Importance of the Study

The Aleutian Campaign has been called the "forgotten war"; few Americans today are aware Japan occupied American soil during World War II. The Aleutians offered some strategic importance to both the United States and Japan. Japan feared an American invasion launched from the islands and America did not completely discount a Japanese invasion via this route. Fear caused a chapter of the war to be carried out on a chain of desolate islands in the North Pacific.

The Aleutian Campaign was carried out early in World War II along the over 1,000 miles of the archipelago. Highlights of the campaign include the third American amphibious landing of World War II and the final naval gun battle without air or submarine intervention. The campaign offered an opportunity to practice joint operations, attempting to bring together naval, air force and ground units for coordinated actions.

The intense weather conditions of the North Pacific severely complicated operations over, near and on these islands. Lessons learned from the weather situation faced

during this campaign have implications for modern operations. The Aleutian campaign offers a vehicle to examine the effects of cold weather operations on man and machine, the difficulty of near-land operating areas, amphibious landings in high seas and reduced visibility, and effectiveness and reliability of air assets in unpredictable high winds and reduced visibility.

The Statement of the Problem

The purpose of this study was to examine historical data to determine if climatological factors played a decisive role in the air, land, and sea battles of the Aleutian campaign of World War II.

The strategic significance of Alaska and the Aleutian Islands was pointed out by General William "Billy" Mitchell before a Congressional hearing in 1935:

Alaska is the keystone of the Pacific arch. An aerial campaign against Japan can be pushed to best advantage from this territory...Alaska is the most central place in the world for aircraft and that is true either of Europe, Asia or North America. I believe in the future, he who holds Alaska will hold the world, and I think it is the most important strategic place in the world.¹

From June 1942 to August 1943, Americans fought to push the Japanese from American soil while most Americans were left unaware. The Aleutian Islands appear on a map as a series of stepping stones along a great circle route from Tokyo to Seattle. With Doolittle's raid over Tokyo on 18 April 1942, it appeared that the U.S. had used this route in

reverse. If not carrier launched, Alaska was the only area from which the American planes could have reached Japan. In light of Mitchell's earlier advocacy of the strategic importance of the region Japanese fears appeared warranted.

Without analyzing the weather and terrain conditions of the Aleutians, an amateur strategist might view the islands as a "natural" route for an attack. American strategists did not consider the Aleutians as an acceptable invasion route because of the poor conditions in the region.

Any invading force would have to be transported by air or sea; the Alaskan terrain precludes all possibility of motorized ground invasion. Ships and planes would have to cope with Aleutian weather, chronically unsettled and often bursting out in violent and unpredictable tempests--the famous williwaws, a major menace to navigation--owing to a continual conflict between the warm Japanese current and the bitterly cold air masses flowing down over the Bering Sea. Rain, snow, mist or low thick overcast may be expected 365 days a year in the Aleutians; flying weather is the exception rather than the rule.²

Americans could not rule out that Japanese fanatics might attempt an invasion via this route. Nonetheless, Brig. General Simon Bolivar Buckner, Commander of the Alaskan Defense Command from July 1940 to June 1944, made numerous attempts to improve the defensive posture in the region. However, it was not until after the attack on Pearl Harbor, 7 December 1941, that serious thought and preparations were made for the defense of Alaska.

The Japanese conducted a carrier strike 3 June 1942 at Dutch Harbor, Alaska, as part of their Midway operation. The operation was primarily diversionary and defensive. It was unknown at the time if the Japanese intended for ground forces to seize bases at Dutch Harbor, Cold Bay and Umnak to establish a roadblock of an American attack using this route, or establish footholds for an invasion of North America.

War for the Aleutians followed for the next fifteen months. The only military campaign of World War II fought on North American soil was not a glorious endeavor for the Americans or the Japanese.

The Aleutians theater of the Pacific war might well be called the Theater of Military Frustration. No flag or general officer on either side, with the exception of Rear Admiral McMorris, there won fame or fortune. None of the operations accomplished anything of great importance or had any appreciable effect on the outcome of the war. Sailors, soldiers and aviators alike regarded an assignment to this region of almost perpetual mist and snow as little better than penal servitude. Both sides would have done well to have left the Aleutians to the Aleuts for the course of the war.³

The Hypothesis

Alaska and the Aleutians offered a unique set of factors which influenced the course of the campaign during WWII for both the Japanese and the Americans. It is hypothesized that of all the factors, weather was decisive in the Aleutian campaign.

The Subproblems

The first subproblem is to determine what the climatological factors are for the North Pacific and Aleutian Islands.

The second subproblem is to determine if weather conditions affected operations in all arenas of battle; air, sea and land.

The third subproblem is to determine how U.S. forces overcame the conditions to defeat the Japanese forces on the islands of Attu and Kiska.

The fourth subproblem is to determine if climatological factors were decisive factors.

The Limitations

The study will describe the weather conditions experienced in the Aleutians.

The study will examine air, sea and ground actions associated with the Aleutian campaign.

Actions will be examined for effect of weather on the timing and the joint aspect of the operations.

The study will examine the effect of weather on the living and fighting conditions during the campaign.

The Delimitations

The study will not examine prewar unpreparedness in the region.

The study will not discuss the logistics efforts by the Americans from the mainland to the Aleutian bases.

The study will not consider the campaign in the South Pacific and priorities of resources available for the fight in the Aleutians.

The study will not examine the political motivations or resolve of either Japan or the United States to wage war in the Aleutians.

The study will not examine the conflicts between Army and Navy leadership or the military and the government as to how to manage the region or fight the fight.

The Definitions of Terms

Climate. Climate is the average course or condition of the weather at a place over a period of years as exhibited by temperature, wind velocity and precipitation.

Meteorology. Meteorology is the science that deals with the atmosphere and its phenomena and especially with weather and weather forecasting.

Weather. Weather is the state of the atmosphere with respect to heat or cold, wetness or dryness, calm or storm, clearness or cloudiness.

Williwaw. Williwaw is the Aleut word for the violent, hurricane force winds in the region which can exceed 100 miles per hour.

Abbreviations

A.A.F. - United States Army Air Force

AP - Armor-piercing; HC - High-capacity; HE - High-explosive; all shells.

BB - Battleship

BLT - Battalion Landing Team

CA - Heavy cruiser; CL - Light cruiser

CCS - Combined Chiefs of Staff

CNO - Chief of Naval Operations

Com - As prefix, means Commander

CTF - Commander Task Force; CTG - Commander Task Group

CV - Aircraft carrier; CVL - Light carrier; CVE - Escort carrier

DD - Destroyer; DE - Destroyer escort; DMS - Destroyer minesweeper

div - as suffix, means Division

JCS - Joint Chiefs of Staff

LC - Landing craft; LCI - Landing craft, Infantry; LCM - Landing craft, mechanized; LCVF - Landing craft, Vehicles and Personnel

LSD - Landing ship, dock

NAS - Naval Air Station

O.N.I. - Office of Naval Intelligence

PT - Motor torpedo boat

SC - Submarine chaser; also Air-search radar; SG -
Surface search radar

ron - As suffix, means Squadron

Aircraft Designations

United States

<u>Desig.</u>	<u>Nomenclature</u>	<u>Service</u>	<u># Eng.</u>	<u>Description</u>
B-17	Flying Fortress	Army	4	heavy bomber
B-24	Liberator	Army	4	heavy bomber
B-25	Mitchell	Army	2	medium bomber
B-26	Marauder	Army	2	medium bomber
F4F	Wildcat	Navy	1	fighter
OS2U	Kingfisher	Navy	1	scout-observation
P-38	Lightning	Army	2	fighter
P-39	Airacobra	Army	1	fighter
P-40	Warhawk	Army	1	fighter
PBY	Catalina	Navy	2	seaplane
PBY-5A	Catalina	Navy	4	amphibian
PB4Y	Liberator	Navy	4	heavy bomber
PV-1	Ventura	Navy	2	medium bomber

Japanese

Betty	Mitsubishi	Navy	2	high-level or
	Zero-1			torpedo bomber
Emily	Kawanishi	Navy	4	patrol bomber
	Zero-2			(flying boat)
Kate	Nakajima 97-2	Navy	1	high-level or
				torpedo bomber
Mavis	Kawanishi 97	Navy	4	patrol bomber
Zeke	Mitsubishi	Navy	1	fighter, called
	Zero-3			"Zero"

The Assumptions

The first assumption is that U.S. forces took
actions necessary to overcome the adverse conditions faced
in the Aleutian theater.

The second assumption is that the U.S. desire to remove Japan from the Aleutians was stronger than Japan's desire to hold the islands.

The third assumption is that neither Japan or the U.S. adequately planned for the climatological conditions in the theater.

CHAPTER 2

LITERATURE REVIEW

This chapter discusses the literature available for this study. The available material is divided into four general categories. They are official and unofficial histories, combat narratives, and observer reports, including anecdotal accounts from the soldiers, sailors and airmen who fought in the theater.

Official Histories¹

These publications offer a broad overview of the campaign and its relative position in the entire history of World War II. These accounts are valuable for establishing a time-line for the study. The History of United States Naval Operations in World War II by Samuel E. Morison is a fifteen volume set recounting the entire war. Volumes IV and VII are used for this study. Volume IV discusses the action at Midway and the simultaneous diversionary attack at Dutch Harbor. Volume VII covers the remainder of the Aleutian campaign from the naval perspective. The unfavorable weather conditions are mentioned throughout the account of naval participation in the securing of the Aleutians. Dangerous high seas and dense fog frequently

delayed planned naval operations in the theater. The fog not only screened Japanese activities, it also benefited the Americans, masking westward advances along the island chain.

The Eleventh Air Force was responsible for the North Pacific theater. Weather and geographical features hindering air operations are discussed in volume IV of The Army Air Force In World War II. The account addresses non-combat losses and mechanical problems due to weather. Successful air operations required runways to be located closer to the enemy to overcome the sheer distance factor and the rapidly changing weather from one end of the island chain to the other. The difficulties overcome in the construction of these runways is remarkable. The environment in the Aleutians was not favorable, yet the Americans managed the problem in spite of the weather.

Unofficial Histories²

Brian Garfield's, The Thousand-Mile War is the primer on the War in the Aleutians. Garfield draws from official documents, diaries and personal interviews to accurately recount the campaign. Chronology and facts are paralleled in the official Navy and Army Air Force publications. Throughout this work is the constant thread of the miserable weather conditions in the region and the effect on operations throughout the campaign.

A broader discussion of pre-war preparedness and various construction projects throughout the region is found

in The Forgotten War, A Pictorial History of World War II In Alaska and Northwestern Canada, by Stan Cohen. Cohen recounts the ground, sea and air actions of the campaign and highlights the effect weather played in each arena. Describing the action on Attu; "The Aleutian cold and wet muskeg were putting more men out of action than the enemy."³

As American forces moved west to Adak and Amchitka troop numbers grew. Bridge to Victory: Story of the Reconquest of the Aleutians discusses this period from the perspective of a soldier. The reader must exercise care in assessing the information in this text. It does generally follow the sequence of events as discussed in other sources, but lacks documentation. This personal account outlines the living conditions faced by the men in the Aleutians which featured cold, high winds, snow and rain, and mud leading to frost-bite and immersion foot. Its value is in gaining an appreciation for the misery of the soldier and the living conditions in the Aleutians.

Various periodicals⁴ address singular events throughout the campaign. These events include: the bombing of Fort Mears during the Dutch Harbor raid, the mysterious "Battle of the Pips" prior to the invasion of Kiska, The Battle of the Komandorskis, the battle for Attu and the Japanese withdrawal from Kiska. Often one can determine the role played by weather in each of these key events by combining these periodical accounts with the overarching

histories. In this way one does not view the events in a vacuum and is less likely to skew the interpretation.

Combat Narratives⁵

To this point the majority of the sources reviewed have been secondary sources. Combat narratives are key primary sources. Army Air Forces In the War Against Japan 1941-1942 alludes to some of the tactics employed to overcome the difficulties caused by the weather.

The Aleutians Campaign from the Office of Naval Intelligence is cited throughout the other historical accounts of the campaign. It offers detailed discussions of naval actions during the invasion of Attu and Kiska. The Aleutians Campaign also discusses the Battle of the Komandorskis in blow-by-blow detail. From such detailed and factual accounts the reader can assess what the effect of weather was on naval operations and make a determination if these effects influenced the outcome of the action.

Observer Reports

Observer reports are valuable primary sources. Weather in the Aleutians is a first hand report from a trained weather observer with the Eleventh Army Air Force covering a 20 month period beginning in May 1942. The report discusses early attempts to outsmart the weather and offers insight as to operation planning with respect to the weather.

The Japanese were not unaware of the climatological conditions in the region. "Good weather is extremely scarce throughout the year."⁶ Weather Data of Asia Including the Kuriles, the Aleutian Islands and Alaska is a compilation of miscellaneous weather data from Japanese documents. Temperature, precipitation, winds and fog are described for sectors along the Aleutians and into the Bering Sea. The Japanese, knowing the conditions that would oppose naval and air operations in the North Pacific, probably did not intend to invade the United States via this route.⁷

One can gather from observer reports the influence weather had on the Japanese situation on Attu and Kiska. The Japanese faced the same enemy as the Americans, weather. The weather hampered resupply and construction efforts. Both would prove crucial for the Japanese.

Personal accounts⁸ of those who fought in the theater describe the misery of the cold and wet experienced by the soldier and the thrill of flying in the dense fog common along the islands.

CHAPTER 3

RESEARCH METHODOLOGY

This was a historical study of the Aleutian campaign. A chronological approach to the events was most effective. As a preface to the discussions of the effects, I reviewed the normal weather conditions in the theater. This discussion includes the conditions which create the weather in the region.

I broke the campaign into three portions:

1. Background to the Japanese attack at Dutch Harbor and subsequent occupation of Attu and Kiska (June 1942.)
2. Dutch Harbor to Amchitka; American efforts to remove the Japanese from the Aleutians through the American occupation of Adak (August 1942) and Amchitka (January 1943.)
3. Attu and Kiska invasions; continued American efforts to force the Japanese out of the Aleutians culminating with the invasion of Attu (May 1943) and invasion of Kiska (August 1943.)

I examined all sea, air and ground actions during each of the periods. Generally, weather played havoc with air and sea operations throughout the campaign. The effects of

weather on ground action became most dramatic during the invasion of Attu. I recounted air, sea and ground actions and noted to what degree the weather contributed to or detracted from the activity, as well as the possibility of joint operations. I also noted Japanese and American efforts to counteract the weather. Finally, I reviewed each portion of the campaign to determine if the effects of the weather were decisive in the American victory.

CHAPTER 4

BACKGROUND AND JAPANESE ATTACK AT DUTCH HARBOR

Weather Conditions of the North Pacific

Those who fought in the Aleutian Campaign may well be correct in complaining that the weather conditions in this theater were the worst of the entire war. Nearly every offensive or defensive move by either the United States or Japan was conditioned as much by the weather and terrain as by the efforts of the enemy. The weather conditions reviewed in this section include: temperature, precipitation, fog and wind.

Rain, snow, mist or a low thick overcast may be expected 365 days a year in the Aleutians. The volatile, unsettled conditions in the region are caused by the constant conflict between the warm Japanese Current flowing west to east across the North Pacific and the cold waters and cold air masses flowing down over the Bering Sea. It should be noted that the Aleutians are not Arctic territory. Temperatures are moderate along the island chain. The average temperatures are fifty degrees fahrenheit in the summer and thirty-three degrees fahrenheit in the winter months, seldom dipping below zero.¹

Precipitation, in some form, either rain, snow or mist, can be counted on about 200 days a year. There is no great variation in the amount of precipitation by month or place. Conditions are progressively worse at the western end of the island chain. Attu can expect 5-6 days of precipitation per week.² Throughout the islands, annual rainfall averages 40-50 inches, spread over most of the year. Precipitation is rarely heavy, but reaches a peak in fall and early winter.³ Snow fall is heavy in all parts of Alaska and amounts range from 1-4 meters.⁴ Combined with the near constant rain and drizzle is the fog.

The Aleutians are characterized by persistent overcast conditions. Fog occurs most frequently in the summer months, June to August. It is generally very humid, almost like rain. In the vicinity of the islands it is white and extremely dense.⁵ Fog conditions will occur throughout the entire year. Attu can expect no more than 8-10 clear days per year with rain or fog of varying density the rule rather than the exception.⁶ The combination of high winds and fog is unusual elsewhere in the world; not so in the Aleutians. Because of the unique conditions in the region they frequently persist simultaneously for days at a time.⁷

Wind in the Aleutians is such a overwhelming force the native population named it the "williwaw". The williwaw sweeps down from the mountainous regions of the north and

interacts with the irregular topography of the islands to create a gale to hurricane force wind which hits from top, bottom, east and west all at the same time. Winds are generally gusty throughout the year, with an average speed of twelve knots. Frequently the winds blow at twenty-four knots for twenty-four hours or more.⁸ Gales can be expected at all times except during the summer.⁹ The winds are incessant.

The weather is localized. Surprisingly, areas of high visibility can be found within 20 miles of fog concentrations.¹⁰ Patches of good weather are rare and not of long duration. While the same weather conditions affected operations on both sides, perhaps the Japanese held one advantage; North Pacific weather moves from west to east, the Japanese could try to guess the conditions over the target better than the Americans. These weather conditions posed distinct hardships on military operations throughout the region.

Geography and Terrain

The Aleutian Islands have been described as "as string of islands nobody really wants, and on which nobody but about 900 Aleuts and a handful of American trappers, teachers and traders ever lived in recent times. And not even the native Aleuts--pronounced Ally-oots--like the islands."¹¹ The islands are of volcanic origin and are very mountainous and rocky. There are no trees. Nor are the

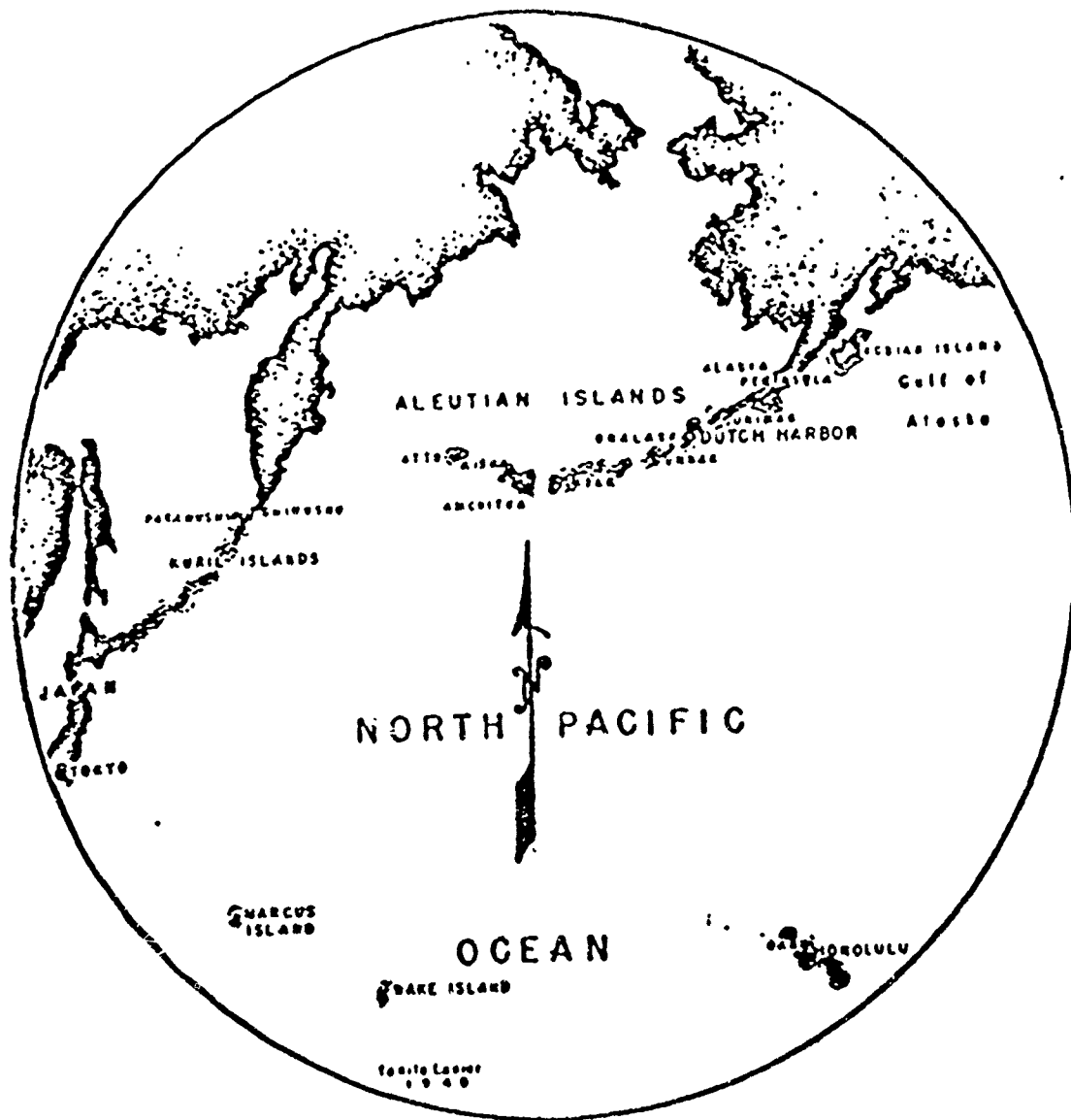
islands very hospitable to military operations. There few places level enough for airfields and few harbors offering shelter for large ships.¹² Tundra covers the islands; a spongy mat of dead grass from one to four feet thick, difficult to walk on and impossible to drive over. Under the tundra is black volcanic ash that turns to mud when it rains, which is most of the time.

Stretching from the tip of the Alaskan peninsula to within 90 miles of the Kamchatka peninsula, approximately 120 islands make up the Aleutian chain. See figure 1. For this study Dutch Harbor, Unalaska, was the eastern boundary of the area of interest. Unalaska is about 2,000 miles from San Francisco and Honolulu. To the west, in order, lie Umnak, Adak and Amchitka. Kiska is 610 miles west of Dutch Harbor. Attu, the westernmost American island, is nearly 1,000 miles from the Alaska mainland and only 750 miles northeast of the Japanese Kuril Islands.¹³

Background to attack at Dutch Harbor

A chronology is provided as figure 2 to orient the reader to the significant events of the campaign from June 1942 to August 1943.

As pointed out in previous chapters, Alaska's strategic location was recognized by General Mitchell and others early. Despite this realization very little was done to improve the defenses. In fact, national policy was not to fortify the Aleutians, this as a result of the five-power



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Figure 1

Washington Naval Treaty of February 6, 1922. The signatories of this treaty, the United States, Japan, Britain, France and Italy, agreed to curtail naval and related construction.¹⁴ As a result, five years before the war, Alaska was virtually undefended.

With the advent of war, the possibility of a carrier raid and Japanese seizure of a base area became likely. Defense of Alaska grew in importance. New bases were constructed and combat units were deployed to the area. Commander Alaska Defense Command, Brigadier General Simon Bolivar Buckner, Jr. had formulated a concept of defense of Alaska very similar to that developed by the War Department. He believed, "Alaska's vast distances, forbidding terrain and harsh climate precluded any major land invasion and that Alaska could only be attacked if the Navy lost control of the North Pacific."¹⁵

General Buckner differed from the War Department on several points. He believed the principal threat would be air or parachute attack or a combination of the two to seize a forward base. He felt the Japanese would use the base for attacking targets along the west coast of Canada and the United States.¹⁶

Though the Aleutians appear to be a natural invasion route, any invasion force would have to be transported by air or sea. The ships and planes would have to contend with the chronically unsettled and violent

weather. Alaska also suffered from being a low priority theater. The strategic risks in the region seemed less grave than those in other areas.

Alaska was the last overseas theater to receive aircraft, and it was at the bottom of General Henry "Hap" Arnold's, Army Air Corps Chief of Staff, priorities.¹⁷ The number one destination for aircraft was England, to fight the Germans. The bulk of AAF aircraft were kept in the States, in theory, to be rapidly deployed to hot spots as required. The overseas priorities were the Philippines, the Panama Canal and the Hawaiian Islands.¹⁸

Admiral Chester W. Nimitz, CINCPAC, learned in early May 1942, that the Japanese would include an attack in Alaskan waters as part of their Midway operation in June. Admiral Nimitz responded by allocating five cruisers, fourteen destroyers, six submarines and associated auxiliaries to Rear Admiral Robert A Theobald, Commander North Pacific Force.¹⁹

Captain Ralph C. Parker, commanded the Navy's Alaskan Sector under the 13th Naval District in Seattle. Captain Parker's "Alaskan Navy" was made up of his flagship the cruiser *USS Charleston*, two destroyers, three Coast Guard cutters, a few converted fishing vessels and ten Catalinas. The "Alaskan Navy" was also allocated to Admiral Theobald to create his North Pacific force, Task Force 8.²⁰

As Commander Task Force 8, Admiral Theobald commanded all defense forces, including Army and Air Force.

The U.S. North Pacific force was divided into six groups. The Main Body of five cruisers and four destroyers were under Admiral Theobald's personal control and patrolled south of Kodiak. The Surface Search Group, essentially the old "Alaskan Navy," was set up as pickets. An Air Search Group of twenty Catalinas and one B-17 based on tenders at Cold Bay, Sand Point and Dutch Harbor, was to conduct daily searches to locate and track enemy forces. The Air Strike Group of sixty-five Army pursuit planes and twenty medium and heavy bombers at Kodiak, Cold Bay and Umnak was to attack the enemy ships. Nine destroyers stationed at Makushin Bay, Unalaska, made up the Destroyer Striking Group. Their purpose was to be available to strike enemy forces approaching Dutch Harbor or Cold Bay. Finally, the Submarine Group; six boats disposed to the east with the hope of intercepting the enemy during its transit.²¹

Navy Directive Number 94, from Imperial Headquarters on 5 May 1942, stated the purpose of Vice Admiral Hosogaya's Northern Area Force: "capture and demolish any points of strategic value on the western Aleutian Islands in order to check the enemy's air and ship maneuvers in this area"²². The mission "was to be a reconnaissance in force with the objectives of destroying a suspected garrison on Adak, launching a diversionary raid

against Dutch Harbor and seizing the islands of Attu and Kiska."²³

Japanese planners suffered from faulty intelligence. They believed Dutch Harbor was garrisoned by a whole army division, while in actuality there were less than 5,000 troops and 650 sailors and marines present. The Japanese also believed that Kiska was defended by between 200 and 300 Marines. Kiska was actually the site of a weather reporting station with ten unarmed men. The wireless station, observatory and garrison of unknown strength which was thought to be at Attu was in reality Mr. and Mrs. Charles Jones ministering to the needs of a small Aleut village. Attempts to gain better and more timely plane reconnaissance of the western islands were defeated by the weather. Submarine reconnaissance of these islands and Dutch Harbor was too late.²⁴

Attack at Dutch Harbor

Admiral Hosogaya's Northern Area Force was composed of Rear Admiral Kakuta's Second Mobile Force (two light carriers, *Ryujo* and *Junyo*; two heavy cruisers, *Takao* and *Maya*; three destroyers, *Akebono*, *Ushio*, and *Sazanami*; and one oiler, *Teiyo Maru*), the Kiska Occupation Force (500 specially trained landing troops and 700 construction troops) and the Adak-Attu Occupation Force (1,200 troops).²⁵

As was usual for the region another in a series of cold fronts swept across the North Pacific during late May.

Steaming at a steady ten to eleven knots toward Dutch Harbor was Admiral Kakuta's Second Mobile Force. The carrier strike force had departed Omanato on 25 May, tucking itself into the leading edge of the front it was effectively hidden by heavy clouds, fog, rain and sleet. The Japanese task force easily slipped undetected through Admiral Theobald's picket-line of ships and submarines. Without radar, the Americans were merely bobbing on the ocean, blind to anything that was not in their immediate area.²⁶

Through U.S. intelligence efforts, Admiral Nimitz knew that the Japanese Aleutian operation was not the main threat but merely bait to draw the Pacific Fleet north away from Midway. He also knew that Dutch Harbor was targeted for destruction by carrier aircraft and that facilities at Adak were to be destroyed by a landing force and then Attu and Kiska invaded.²⁷ 28 May, Admiral Nimitz shared this intelligence estimate with Admiral Theobald.

In spite of this intelligence information, Admiral Theobald believed that the Japanese intended to land somewhere between Umnak and Cold Bay and seize Dutch Harbor. As a result he deployed his Main Body about 400 miles due south of Kodiak to be in position to defend the Eastern Aleutians and Alaska.²⁸ He deployed twelve of twenty PBYS to Dutch Harbor.

Admiral Theobald also persuaded Brigadier General William O. Butler, Commander Eleventh Army Air Force, to

redistribute the bulk of his aircraft from Kodiak and Anchorage forward to the two westernmost airfields at Cold Bay and Otter Point to be in position to support naval forces in defense of Dutch Harbor. Twenty-one P-40s and fourteen bombers were sent to Cold Bay and twelve P-40s to Otter Point. These aircraft were equipped with radar, which made operation in fog practicable, but the pilots lacked experience with the Aleutian weather and terrain, and had not trained flying over water.²⁹

The American situation by 28 May saw daily search flights; 400 mile radius from the three western airfields and tenders, and up to 700 miles from Kodiak. Twenty small cutters and converted fishing vessels were deployed as picket ships on the North Pacific and Bering Sea approaches to Dutch Harbor.

Air reconnaissance was almost impossible. Admiral Kakuta's men had heard a PBY pass overhead on 2 June as his ships were refueling at sea in preparation for the next day's attack on Dutch Harbor. Two zeros had been launched, but the pilots were stymied by the thick fog that hid friend and foe alike.³⁰ American patrol planes had found and lost the Japanese fleet in the fog and storm before bombers could be directed to the area for an attack.

On 3 June, as the Japanese were preparing to launch their attack, weather at Dutch Harbor was an unknown factor. To complicate the mission, intelligence about the island was

also poor. The pilots would have to operate at high altitude with maps of Unalaska which showed only a coast line.³¹

The morning of the attack broke with fog; the timing of the attack would have to be perfect if the pilots were to have enough visibility to locate Dutch Harbor, bomb it, and find their way back to the carriers. From a launch position 165 miles south of Dutch Harbor, two carrier groups--6 Zeros and 6 Kates from *Ryujo* and 12 Zeros and 13 Kates from *Junyo*³²--flew into deteriorating weather.

The dive bombers needed at least a 6,000 foot ceiling to commence their attack. Doubting they would find adequate conditions at the target, eleven of *Junyo's* Kates turned back. True to form, the unpredictable weather began to clear as the flight approached Dutch Harbor. *Ryujo's* planes found excellent weather over the target with a ceiling of 10,000 feet.

The attack began at 0545. By 0635 the dive bombers had completed their attack, and the first strike was returning to Kakuta's fleet which was within 130 miles of Dutch Harbor in radio silence. As the planes returned the weather deteriorated, but all planes were successfully recovered. PBY crews were unsuccessful in their attempts to locate the Japanese because of to the weather.

On their return, planes of the first strike had spotted five of the American destroyers at Makushin Bay.

The destroyers became the target for the second strike. The weather continued to deteriorate and now favored the defense. Unfortunately for the Japanese not one of the planes was able to find the American destroyers.

Overcast had hidden the American airfields at Otter Point and Cold Bay from earlier Japanese reconnaissance efforts. One of the groups from the Japanese second flight unknowingly overflew the Otter Point airfield. Two Army P-40s, on combat air patrol (CAP) over Otter Point, engaged the Japanese aircraft.³³

Until this time the American planes at Otter Point and Cold Bay were unaware of the activity at Dutch Harbor. The message of the attack and order to launch never got through the poor communications.

Not geared for high speed and high volume of traffic, the communications system between the Navy base and the forward Army airfield failed. Poor communications continued to interfere with the American attempts to counter the Japanese. A VP-42 PBY had spotted the Japanese carriers and escorts preparing to recover aircraft through a patch in the fog, had radioed position reports with location, disposition, course and speed, but unfortunately, the transmission was garbled.³⁴ The Japanese carriers and cruisers closed to within 130 miles of Dutch Harbor, recovered their aircraft, and commenced a retirement to the

southwest. So far in the battle, only one American plane had sighted the Japanese fleet.

Visibility remained poor. Kakuta's weather officer was predicting the weather at Dutch Harbor to be even worse the next day. The plan for 4 June was for an air attack against supposed installations on Adak, with air reconnaissance planned for Atka. Kakuta fueled the destroyers and headed for Adak.

The morning of 4 June found Admiral Kakuta's force about 250 miles southeast of Adak. The weather in the area had changed dramatically. The wind velocity had increased from twenty-five to thirty knots. Because of the sea conditions, the speed of the ships had been reduced to nine knots.

Admiral Kakuta would not be able to reach the launch point against Adak by the scheduled time. To go through with the operation against Adak would require aircraft to be launched and recovered in very hazardous conditions. The unpredictable weather proved to be clear to the east making Dutch Harbor a better option.³⁵ Kakuta ordered the course change and headed northeast for a second attack on Dutch Harbor.

The thick weather continued to aid Kakuta, enabling him to elude all search planes and picket ships. Admiral Theobald's main body was out of position and in radio silence throughout the attacks on Dutch Harbor. He had

positioned against an invasion which was never intended for Dutch Harbor. By late afternoon the Japanese had launched eleven dive bombers, six Kates for high level bombing and fifteen fighters. This time Admiral Kakuta had been adamant that the more accurate dive bombers carry out the mission regardless of the weather at Dutch Harbor. At the time, the cloud ceiling was at about six thousand feet. By 1800 the second attack on Dutch Harbor was underway.

By a stroke of bad luck the Japanese had chosen Ship Rock, a prominent landmark in the Umnak Pass, about three miles east of Otter Point, as their rendezvous point. The Japanese had chosen to regroup in close proximity of the American airfield. The fighters at Otter Point were again unaware of anything happening at Dutch Harbor. The Americans had a CAP up because of their high state of readiness in anticipation of an invasion. The P-40s on CAP engaged the Japanese as they rallied at Ship Rock. The fight with the American planes caused the Japanese to expend critical fuel. As the Japanese pilots were attempting to return to their carriers, some were repeatedly asking for directions and announced they were running out of fuel as they groped through the terrible Aleutian weather.³⁶

During this portion of the attack it became obvious that the Japanese Midway operation was going badly. While planes were still over Dutch Harbor, Yamamoto ordered Kakuta's force south to rendezvous with Nagumo, the

occupation of the Aleutians was temporarily postponed. Less than two hours later Yamamoto informed Hosogaya that the occupation of the western Aleutians must go on as planned.³⁷ The Japanese landed on Attu and Kiska, possibly to deny the Americans forward staging or an invasion route, or maybe just to salvage a moral victory for the day by holding a small piece of American territory.

The tally after the Dutch Harbor attacks was 78 Americans killed and 14 planes downed: for the Japanese; 15 killed and less than 12 planes downed.³⁸ The Aleutians battle, so far, had been an air power contest. The part weather played in this portion of the contest appeared to favor the offensive; shrouding ships from view and twice sweeping land targets clear in time for the attacking forces to take advantage.

The Aleutian campaign entered a new phase as Japanese occupation troops are landed on Kiska and Attu. The Americans were faced with the prospect of an enemy lodgement on North American soil. The next period of the campaign featured the Japanese trying to hold on to their meager gain, and the Americans trying to knock them off the Aleutian Islands.

Summary

The climatological factors in the theater were some of the worst of the war. Precipitation, wind and fog directly affected operations on the tactical level. At the

outset the Japanese successfully avoided detection as they approached Dutch Harbor, hiding in the leading edge of a storm as it tracked east across the North Pacific. The overcast then played a key role in the "luck" experienced by both sides during the two attacks on Dutch Harbor.

Though weather conditions drastically influenced action at the tactical level they were not the decisive factor at the operational level. Many factors combined to produce the ineffective American response. Alaska's status as a secondary theater led to its general unpreparedness for war. The airbases at Cold Bay and Otter Point were not yet completed, and the inadequate communication system prevented an effective response by the bomber assets which were in the area. If the Americans been able to locate the Japanese fleet, an affective attack by land based bombers may have driven the enemy from the region.

ALEUTIAN CAMPAIGN

3-4 Jun 1942	Japanese attack Dutch Harbor, Alaska
7 Jun	Japanese occupy Kiska and Attu
30 Aug	Americans occupy Adak
10 Sep	Adak airstrip operational
18 Dec	JCS directs planning and training for American invasion of Kiska
12 Jan 1943	Americans occupy Amchitka
16 Feb	Amchitka airstrip operational
11 May	Americans invade Attu
30 May	Americans successfully retake Attu Americans occupy Shemya
7 Jun	American airstrip on Attu operational
21 Jun	Shemya airstrip operational
27 Jul	Japanese complete evacuation of Kiska
15 Aug	Americans invade Kiska

Figure 2

CHAPTER 5

STRONG ATTRITION

Following the Japanese attack at Dutch Harbor the Aleutian Campaign was fully underway and the majority of the next eleven months shaped up to little more than a stalemate. The period from 6 June 1942 to May 1943 encompassed the occupation of Kiska and Attu by the Japanese, through the American landings on Adak and Amchitka, and closed prior to the American invasion of Attu. Air and naval actions were the dominant features of this period. These actions were reviewed for the effects of the weather on mission planning, man and machine.

Japanese Occupy Kiska and Attu

Following the 4 June raid on Dutch Harbor Admiral Kakuta's force diverted to an area 600 miles south-southwest of Kiska and rendezvoused with Admiral Hosogaya. Kakuta's force was positioned to intercept any American forces coming up from Midway and remained in this vicinity for about ten days. In the meantime the Japanese landing forces occupied Kiska and Attu.

On 6 June, the Japanese No. 3 Special Landing Party and 500 Marines landed on Kiska. American presence on the

island was a ten-man Naval Weather Detachment, all members were eventually taken prisoner. The Japanese 301st Independent Infantry Battalion landed on Attu.¹ The Japanese did not execute the planned landing on Adak, concerned that the island was too close to the previously undetected airbase at Otter Point.

Throughout the period the U.S. Navy searched unsuccessfully for the enemy fleet. No weather reports or other communications had been received from either outpost since 7 June. Americans feared the Japanese had occupied these two islands of the western Aleutians. It was not until 10 June that a bomber from the 36th Bombardment Squadron discovered the Japanese on the islands. Also on the 10th, Catalinas reported ships in Kiska Harbor. So began the effort by the Americans to evict the Japanese from the islands. But as it had before and as it would do again in the future, the weather obscured the movements of the opposing forces.²

Americans Attempt to Bomb Japanese Out

In hopes of driving the Japanese out of the Aleutians, Admiral Theobald ordered American forces to inflict "strong attrition"³ on the enemy at every opportunity. Army Air Force and Navy bombers found few opportunities. This was not an easy order to obey. The weather played a large interference role.

The first mission by Army heavy bombers of the Eleventh Air Force against Kiska was on 12 June. Because of the heavy flak and poor visibility, it was difficult to determine the results. Throughout the campaign it was difficult to determine exactly how successful bombing missions were because much of the bombing was through holes in the overcast. From the time the bombs were released until impact a new cloud pattern could roll in and obscure the target.⁴ Admiral Kakuta was ordered north to intercept the American planes, but Aleutian weather prevented both ships and planes from interdicting the other. The Americans did not divert naval forces from Midway to respond to the Japanese activity in the Aleutians. Japanese naval forces soon retired from the area.⁵

After finding enemy ships in Kiska Harbor, Navy PBYs of Navy Patrol Wing 4 began the "Kiska Blitz". The Catalinas, stationed at Atka with the tender *Gillis* in Nazan Bay, tried to pickup where the Eleventh Air Force bombers had left off and bomb the enemy out of Kiska.

The PBY was generally not well suited for such a mission. It was slow, difficult to maneuver, lightly armored and armed. The PBYs were in the air constantly for three days and inflicted minimal losses on the enemy. The PBYs sank three Mavis' and scored some hits on enemy ships. The price paid by the squadron was high; half of the planes were lost, and fuel and ammunition had been nearly

exhausted. Following the intercept of messages indicating a possible Japanese attack on Atka, Nimitz stopped the Kiska Blitz and ordered the island evacuated.⁶

The Army Air Force found the problem of weather severely complicated the problem of distance travelled from their base at Umnak to the target, Kiska. Weather forecasts were of little value to the flyers since the conditions could change more rapidly than they could fly.

In an attempt to beat the weather, it became standard practice to send one of the heavy bombers from Umnak early in the morning to act as weather plane. The weather plane took off from Umnak and sent back weather reports every half hour. Upon reaching the target, it circled Kiska first, Attu second and sent back reports on shipping and weather. The weather officer back at the base could then get a fair idea of what weather to expect.

To make matters more difficult there were only seven weather officers in the theater at the outset of the campaign.⁷ Also, the idea that weather moves from west to east is true only in a general sense. The weather in the Aleutians can approach from the southwest or come down from the northwest. Knowing what the weather is at Kiska in the morning will not guarantee what the weather will be like along the chain for the rest of the day.⁸

Usually if the weather plane found conditions favorable over the target, the other bombers would take off

to attack. More often than not, missions had to be cancelled on account of the weather. The Army Air Force had only six successful missions from 11-30 June 1942.⁹ During July 1942 there were only fifteen days that the weather plane advised the mission to proceed. Of those, seven missions were cancelled and the planes were forced to return to Umnak before completing their mission because of the weather.¹⁰

If the planes did get through to the target, they were often forced by the low ceiling and poor visibility to bomb from low altitude, or make bomb runs by dead-reckoning, taking their bearings from Kiska volcano for time-distance runs.¹¹ Due to the overcast bombs were dropped without any determined results.

Distance and weather continued to inhibit the effectiveness of the bombers as did the anti-aircraft system installed on Kiska by the Japanese. Until the missions could be run with fighter support, they would produce disappointing results.¹²

The bombing missions continued into August with very little damage to Japanese installations. The attacks had a nuisance value which interfered with the Japanese efforts to develop their support base and defense system. The bombings also forced the enemy ships out of Kiska Harbor further disrupting their resupply efforts. Admiral Theobald ordered an end to the ineffective bombing through

the overcast by time-distances fixes, it was a waste of crews and bombs with no apparent results.¹³

The Aleutian weather prevailed during most of August; more missions were cancelled or aborted than succeeded in reaching Kiska.¹⁴ Though the bombardment squadrons had worked toward perfecting low-level bombing, sporadic missions could not drive the enemy out of the Aleutians. Japanese installations at Kiska and Attu could not be neutralized by long-range bombardment as then conducted.¹⁵ Admiral Theobald planned for naval gunfire from his cruisers and destroyers to discourage the enemy from persisting in the area.¹⁶

Naval Missions Against Japanese

Admiral Theobald, in his flagship, heavy cruiser *Indianapolis*, sortied his strike force 19 July. The strike force was composed of the following: a second heavy cruiser, *Louisville*; three light cruisers, *Honolulu*, *St. Louis*, and *Nashville*; five destroyers, *Case*, *Reid*, *Gridley*, *McCall*, and *Monaghan*; and four destroyer/minesweepers, *Lamberton*, *Elliot*, *Long*, and *Chandler*. The original date for the bombardment was set for 22 July. The task force steamed all day 21 July in the fog, but the mission was postponed and the force retired to the east.¹⁷

Returning on 27 July, the task force found heavy fog again, and again the mission was postponed. As the force executed the course change to retire, two of the four

destroyer/minesweepers collided and a third was rammed by the *Monaghan*. All four ships were steaming at reduced speed in high seas. *Monaghan*, *Lamberton*, *Long*, and *Chandler* were no longer available for the mission.¹⁸ As a result no preliminary sweep for mines was available, and Admiral Theobald would not risk his force within gunfire distance of Kiska without the minesweep. Admiral Theobald's choice was once again unfortunate, as Kiska Harbor was full of shipping: three destroyers, two small minelayers, a tanker, 10,000 ton transport, and two freighters.¹⁹

The task force sortied from Kodiak for a second attempt on 3 August, this time with Rear Admiral William W. Smith in command. The ships were the same less the four damaged previously. The plan was for three coordinated bombardments of Kiska Harbor shipping and adjacent shore facilities. Catalinas scouted ahead of the group for holes in the fog.

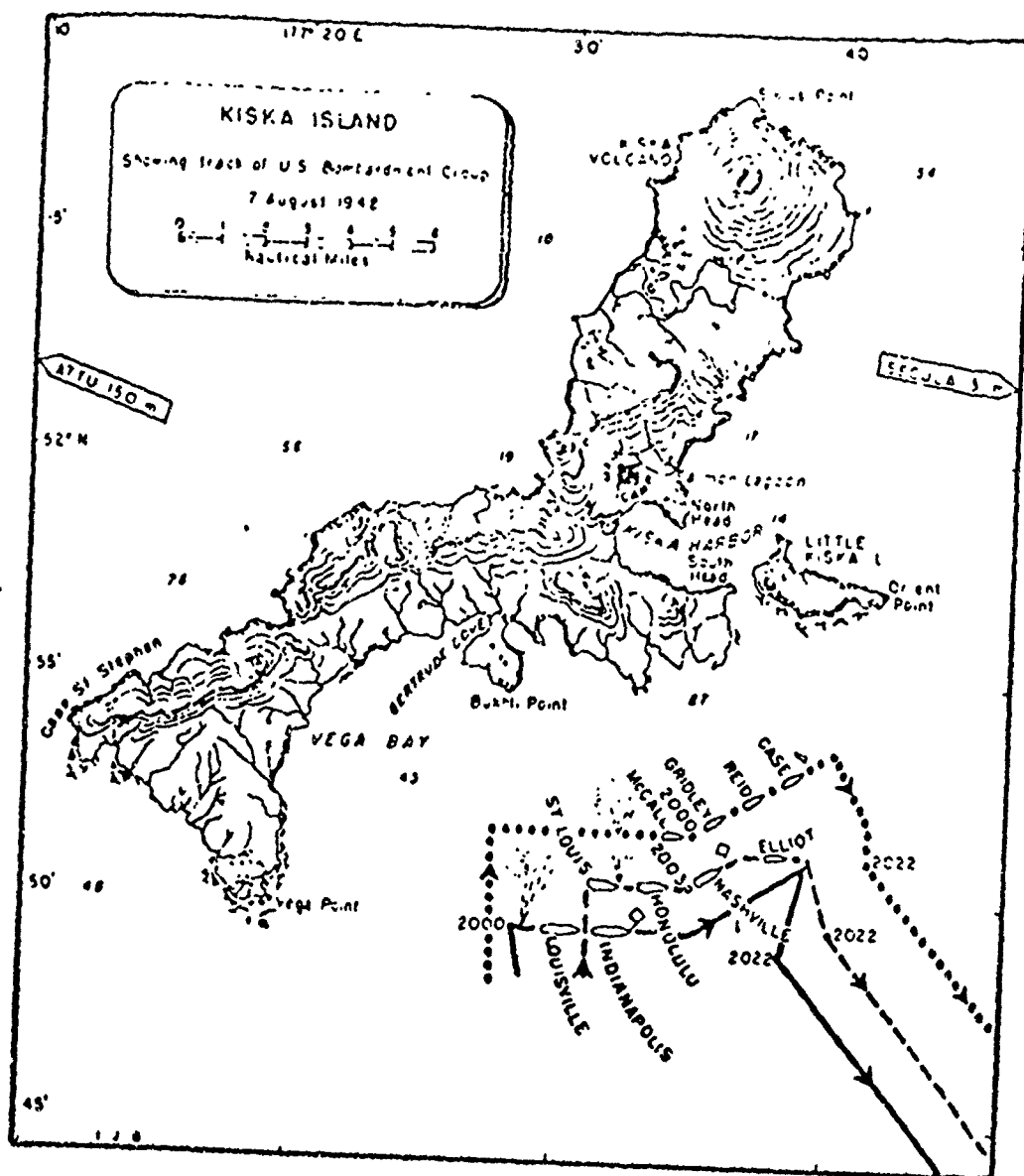
On 7 August there was enough fair weather for a close approach. Winds were from the northwest at 1-3 knots, seas were smooth, surface visibility was 8-10 miles, but it was completely overcast with a ceiling of 500 feet. At 1630 Admiral Smith made a twenty-knot run into the fog bank. By 1800 he reached a relatively clear space, but there was no sighting of land, the fog closed and the water shoaled rapidly. The navigators did not know where they were, Smith was forced to pull out and try again.²⁰

At 1825, on 7 August, Admiral Smith received the first report in four days of shipping in Kiska Harbor. Japanese shipping present in Kiska Harbor was composed of the following: ten transports or cargo ships, 4 submarines, one large destroyer or light cruiser. In addition one destroyer and one smaller ship were patrolling off the entrance.²¹

At 1934, Admiral Smith made his second approach, as the fog lifted land was sighted. Destroyers and cruisers ran in and out of the fog as they closed their firing positions. The firing positions were not from the mouth of the harbor, in view of enemy installations, but rather four to six miles south of the South Head, over which all the ships had to shoot indirect fire; destroyers at a range of 14,500 yards and cruisers at ranges of 16,800 and 19,500 yards. See figure 3.

The destroyers opened fire at 1955, followed by the light cruisers at 1957 and heavy cruisers at 2000. Spotting was difficult because of the fog bank and enemy Zekes forced spotting planes into the clouds. In the half-hour bombardment, 631 eight-inch rounds, 3,534 six-inch rounds, and 2,620 five-inch rounds were fired with undetermined results.²²

Three days later air force planes returned, photography revealed one destroyer hit and possibly sunk, one transport hit and probably destroyed, another transport



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Figure 3

possibly sunk, various batteries silenced and moderate damage to shore installations. The pilots were, however, unable to determine if the damage was caused by naval bombardment or previous air force bombings.²³ The fog had prevented the Eleventh Air Force bombers from participating in the effort as previously planned.

Commenting on the evolution, Task Group Commander Admiral Smith said the "results from naval guns hardly justified the risk to big ships...there had been two collisions during earlier sorties...with good visibility a squadron of bombers might do more damage."²⁴ Viewed from a grander perspective, Admiral Nimitz, CINCPAC, commented:

Coming simultaneously with our movement into the Solomons, this action in the north in addition to the damage caused, probably had some diversionary effect, as there appeared to be considerable delay in the movement of the majority of the Japanese carriers or other heavy units to the South Pacific.²⁵

For perspective, elsewhere in the Pacific theater, Americans landed in the Solomons 7 August 1942. On 24 August carriers fought the Battle of Eastern Solomons, the first in a series of actions in support of Guadalcanal.

U.S. submarines played a disappointing role in the Aleutian Campaign. Much of their poor performance can be blamed on the weather they encountered. The American Navy had two basic varieties of submarines. The large fleet-type submarines displaced nearly 1,500 tons while smaller S-boats displaced only 800-1,100 tons.²⁶ The S-boats were sent to

Aleutian waters to provide information on Japanese fleet movements in Alaskan waters to CINPACFLT and defend the area from Japanese attack. Aleutian waters were bad for large ships; for submarines the williwaws and the pounding heavy seas were the worst of possible operating conditions. The words of Joseph ("Fritz") Harlfinger, who served on S-boats in Alaskan waters, pointedly describe the situation in which the boats found themselves:

The conditions those boats endured up there are simply indescribable. It was God awful. Cold. Dreary. Foggy. Ice glaze. The periscope froze. The decks and lifelines were caked with ice. Blizzards. You could never get a navigational fix.²⁷

The S-boats spent most of their energy groping about in fog and cold rain just trying to survive the Alaskan waters. Unfortunately, on the whole, S-boats contributed nothing of substance directly to the campaign. The navigational hazards of the Aleutians claimed at least one submarine victim. S-27, commanded by LT Herbert L. Jukes, was on a reconnaissance mission in the vicinity of Amchitka on 19 June when it ran aground. The S-boat had surfaced some five miles off Amchitka to recharge her batteries when the fog closed in and unpredictable currents swept the submarine onto the reef off the island.

Jukes was unable to dislodge the boat. High seas were breaking over the conning tower, she took on a heavy list, the engine room was flooding and chlorine fumes from the wet batteries were filling the boat. A distress message

was sent, but there was no one to rescue them. All hands were put ashore in rubber boats. Six days later the crew was found by a Navy search plane, rescued and returned to Dutch Harbor.²⁸

Following the disaster at Midway, Yamamoto filled the routes between the Aleutians and Japan with carriers, cruisers, destroyers and many transports. U.S. submarines should have found a target rich environment.²⁹ In addition U.S. codebreakers provided information concerning the movements of these vessels. But the submarines in the North Pacific still turned in a disappointing performance for a variety of reasons. They were operating in strange waters, and the Japanese were operating numerous submarines in the area. As already described, the S-boats were hampered by the extreme weather conditions and they had poor charts of the region. The S-boats found no major vessels on these North Pacific patrols. Most attacks were against Japanese destroyers or patrol vessels.³⁰

One final example of embarrassment to the S-boats caused by the weather came in October to the *Halibut*. An effort was made to employ aircraft in finding targets for her. This was a new experience for both plane and boat and poor communications compounded problems. The plane had passed the latitude and longitude position of an enemy ship to the *Halibut*. This would have been fine except the S-boat had been running so long in a dense fog that she had no idea

where she was herself.³¹ The *Halibut* never located the target.

Motor Torpedo Boats (PT) were also employed in the Aleutians. They were brought into the region under the premise that under the cover of the perpetual fog they could slip in and torpedo enemy ships. The craft were ill-suited for the area. In the winter the hulls were lined with up to two inches of frost. Combined with the spray and green water freezing topside the boats were dangerously weighed down. The PTs were originally intended to be in position for the enemy invasion of Adak. When the invasion did not develop, they became scouts, supply craft and minelayers.³²

General Conditions

The PBY was the work horse of the campaign; thick weather or clear, they flew. This effort often required warming up engines with blowtorches, scraping snow and melting ice off wings, loading bombs or torpedoes with numb hands, taking off in the dark with frequently overloaded planes, and if water-based, frozen spray obscured the windshield.

Once aloft the perils were not over; foul weather required radar navigation, and at this time, radio aids to navigation are almost nonexistent in the region. Compasses swung widely in the northern latitudes; the altimeter, calibrated on barometric pressure, could be misleading if the plane flew through a weather front where the pressure

changed. Celestial navigation was out because of the persistent overcast. Finally the clouds hid landmarks, as well as mountains.

There were numerous incidents of PBVs smashing into mountain sides as the crews searched in the overcast and fog for a landing site.³³ Any PBV forced down in the open sea was doomed, and unless rescued promptly the survivors died of exposure. The life expectancy in the Aleutian waters was approximately twenty minutes.

In order to keep a minimum number of planes operational, ground crews had to work in the severest kinds of weather. Because of the lack of facilities, maintenance and repair work was performed outdoors, often in blinding rain and snow blowing in horizontal sheets. Living conditions at the forward bases were primitive. Tents and small structures often collapsed under the gale winds. The dispersal areas were generally mud quagmires, and roads were nothing more than tracks through boggy muskeg.

Air Superiority Established

Despite these incredible conditions, Americans established air superiority in the theater. In addition to the bombing missions against Kiska, reconnaissance and patrol missions were flown over the Japanese held islands and those lying between Umnak and Kiska. The heavy bombers patrolled the Bering Sea coast in persistently bad weather for 8-10 hours. The P-38s of the 54th Fighter Squadron flew

along the Aleutian chain. Seldom were enemy aircraft encountered; generally it was a war against nature.

The P-38, Lightning, was a new aircraft put to its first test in the Aleutians. The twin boom fighter was originally designed to intercept bombers at high altitude. It had two important advantages over the single engine fighters: two engines and the range required to operate over the vast watery expanses of the North Pacific and Bering Sea. As a result, the Lightning pilots drew the most missions and suffered the most casualties. Half of the original thirty pilots were dead within a year.³⁴

In a paper presented at "Wings Over Alaska" conference, February 1980, Colonel Stan Long, USAF (Ret), a 54th Squadron survivor related:

None of the pilots sent to Alaska were highly qualified. We were just out of flight school with practically no gunnery training with the exception of a few hours in a link trainer. Our planes only had the needle, ball and airspeed indicators which was barely enough to permit us to fly through a fifty-foot overcast, let alone make an instrument landing penetration. In the Aleutians where we were to be based, there were no navigational aids or facilities for instrument landings available even if we had possessed the equipment in our planes or had the proper training to utilize it. So it is not surprising that our attrition rate was very high, and those that survived were just damned lucky.³⁵

By August 1942 Eleventh Air Force aircraft numbers were up to 226 with 212 classified as "combat" as shown in figure 4.

XI AAF August 1942 Inventory

111	single engine fighters
21	P-38, twin engine fighter
22	RCAF fighters, limited range
47	Medium Bombers
23	Heavy Bombers
	(6 B-17s)
	(15 B-24s)
	(2 LB-30s)

Figure 4

These numbers were reduced by maintenance problems to an average of three B-17s, twelve B-24s, nineteen P-38s and one LB-30.³⁶

The situation faced by the Japanese was more desperate. Of the original twenty-four float planes left behind at Kiska in June, only two were operational by September 1942. More than half had been destroyed by storms, the remainder by U.S. bombers. Twelve of the original Rufes suffered the same fate.³⁷ The Japanese continued to ship crated replacements to either Kiska or Attu to be assembled. The Eleventh Air Force and the weather managed to keep the inventory of float fighter and reconnaissance aircraft at Kiska to fourteen or usually fewer.³⁸

Thus far the American air campaign had accomplished its mission of preventing development of either Kiska or Attu as a major enemy base for further advances eastward. The Japanese did not conduct further bombing missions on American bases in the eastern Aleutians. Both the Americans

and the Japanese were faced with the same problem of securing bases closer to the enemy so that fighter protection could be provided on the bombing missions allowing the bombers to deliver more forceful attacks.

American Occupation of Adak

Admiral Theobald made his move to establish an airfield within fighter distance of Kiska. On 21 August he announced plans to occupy Adak. This decision was not free from controversy. General John L. DeWitt, Commander Western Defense Command, and the Army Air Force preferred Tanaga Island, 160 miles east of Kiska, for the new airfield. Adak Island, 210 miles east of Kiska by air, was the preferred choice by the Navy because of the all-weather harbor. D-Day for the occupation of Adak was set for 30 August.

Alaska Defense Command soldiers and about 40 combat intelligence scouts were put ashore on the 28th. There was no evidence of Japanese activity on Adak and search planes revealed no sign of Japanese activity on Amchitka. It was estimated that the islands had been scouted by the enemy.³⁹ On 30 August American forces conducted an unopposed landing on Adak and immediately began construction on the airfield.

When the Japanese learned that the Americans were planning to occupy Adak, they decided to move the garrison from Attu to reinforce the defenses of Kiska. Japanese forces abandoned Attu, conducting the transfers from 27 August-16 September by transports and destroyers, while the

Americans never caught on to the activity.⁴⁰ In addition to these forces, 1000 Marines and 500 civilian workers had been sent in August to reinforce Kiska. By mid-September 1942, Kiska had been redesignated the 51st Naval Base, under the command of Rear Admiral Akiyama.⁴¹

Adak was an uninviting island 435 miles west of Dutch Harbor and about 275 miles east of Kiska by sea. The island experiences about 75 inches of rainfall each year with October and November the wettest months. Temperatures range between 18 and 72 degrees fahrenheit, with winds reaching velocities well over 100 miles-per-hour.

The 30 August unopposed occupation of Adak was led by Major General Eugene M. Landrum. The plan for the landing was for P-38s and heavy bombers at Umnak to attack shipping and shore installations at Kiska from D-minus five days and provide daylight defensive coverage for landing parties on D-Day. The ever present and uncooperative weather fouled the plan. A storm from D-Day through D-plus two kept the Eleventh Air Force grounded. On the positive side, the Japanese were pinned down as well.

The 807th Engineer Aviation Battalion and equipment came ashore 31 August and immediately began to work on the airfield. Colonel Benjamin Talley, the senior engineer of the Alaska Defense Force, headed up the initial construction efforts. To establish the airstrip the engineers drained and filled a flooded tidal basin.

An innovation available to the Americans and not Japan or Germany was "Marston mat." It enabled the Americans to lay a hard runway surface in record time. The mat was 10-foot by 15-inch sections of pierced steel weighing 66.2 pounds with slots along one side and hooks along the other to be interlocked over a prepared surface to form a runway. 60,000 sections of the mat could be laid in a matter of days to build a runway 5,000 feet by 500 feet. It was originally used at the Cold Bay project on Umnak.⁴²

On 10 September the first B-18A landed on the steel mat runway; the Eleventh Air Force now had a base within 250 miles of the enemy. The inventory of aircraft on Adak by 13 September was: fifteen B-25s, one B-17, fifteen P-38s, and sixteen P-39s.⁴³

The last raid from Umnak was on 13 September. The initial raid originating from Adak took off on 14 September. Subsequent construction transformed Adak into the major base in the Aleutians, eventually housing 90,000 men. Other construction projects through the winter of 1942 included: erecting hangers, warehouses, piers, radio stations and dry docks. An emergency airstrip was constructed on Atka and another was planned for Tanaga.⁴⁴

Throughout the winter the Admiral Theobald was preparing bases for forward action in the spring. Much was accomplished in spite of the foul weather and unfavorable terrain; an operational and engineering achievement. By

early 1943 Adak was fully operational. The only limitations on operations was the unpredictable weather and lack of navigational aids.

The fog finally played on the side of the Americans; it was responsible for the activity on Adak not being discovered by the Japanese until early October. The 2nd of October was the date of the first raid by small enemy float planes. These were little more than nuisance bombings.⁴⁵ Admiral Theobald's policy of "strong attrition" continued into the spring of 1943. With the airfield established on Adak, a new phase in the Aleutian campaign was evident, both in tempo and intensity, through the increased air war.

Taking Adak had several advantages for the Americans. It cut the distance to the enemy by about one half. Attacks could be flown by both medium and heavy bombers with fighter escort. The Japanese were able to make only a few retaliatory raids on Adak and were never allowed to take the offensive. The Japanese were also forced to limit the time spent by ships in Kiska Harbor and eventually rely on submarines for resupply.⁴⁶ Even with its new advantage the Eleventh Air Force had difficulty sustaining the strategy of attrition. With the winter months came the long Arctic nights and violent weather.

Though the first Adak mission on 14 September was very successful it was difficult to repeat. Weather

grounded missions for the next ten days. Up to this time the weather had taken its toll on the Eleventh; during the period June to October 1942, it had lost 72 planes, only 9 to combat.⁴⁷

General Butler was briefed on the weather twice a day at 2100 and 0500. Bombers figured on operating everyday. If General Butler could be assured that the weather at the base was going to stay open, or that one of the eastern bases within safe range would be open should Adak close, the mission was carried out, unless observation at Kiska indicated the weather there was too unfavorable.⁴⁸ Weather nearly halted the air offensive during November and December.

There were no missions flown against Kiska for the first six days of November; the first of the winter storms had blown in and for four days rains plus 60 mile-per-hour winds kept everything grounded. On the 7th a mission was flown against Kiska but the results were unobserved because of the overcast.

Flights on the 8th were cancelled. The mission on the 9th was a fighter mission with a B-17 in the navigation support role. The bomber mission on the 10th was turned back. From 11-26 November, either weather prevented flying or the target was obscured by clouds if the mission was able to get through. The 27th saw a successful attack on the *Cherrybounne Maru* unloading arms and equipment on the west

arm of Holtz Bay, Attu. No other strikes were flown for the month of November.⁴⁹

Through most of December, the Eleventh Air Force was grounded. Bombers managed to sink a 3100-ton maru and damage a second in Kiska Harbor on New Year's Eve.⁵⁰ Also of note, the last B-17 mission had been flown on 11 November. The Flying Fortress did not have the range and bomb capacity of the B-24, and there were too few mission-ready. At one point the squadron was down to two aircraft. The B-17s did not stand-up well to the Aleutian conditions and were being used more and more for weather reconnaissance and photo missions.⁵¹

The American occupation of Adak got the attention of the Japanese and renewed their apprehension of a possible invasion of Japan by way of the Kurils. Imperial Headquarters ordered Attu reoccupied and sent more troops into Kiska.⁵²

American crews continued to fight through the weather to get to their target, but their bombs were dropped without observation of the results. The increased weight of U.S. bombings, mostly in September and October, made it difficult for the Japanese to maintain an air force on Kiska. Lacking facilities for land-based planes, the enemy had only a few single- and twin-engine float planes for defense. It was difficult to keep even these planes at strength in the face of American attacks.⁵³

Though the Americans were able to prevent the Japanese from building up offensive potential, they were unable to drive the enemy out of Kiska and Attu. By mid-November the situation was such that Admiral Theobald could begin to plan for the occupation of Kiska. An occupation of Kiska required the seizure of Amchitka. During mid-December U.S. reconnaissance parties surveyed Amchitka.

Admiral Theobald's planned bombardment of Kiska in October fell victim to operations in the South Pacific. He was unable to get the battleships necessary for the mission because of the critical conditions in the South Pacific. Also, there was a somewhat optimistic impression that the U.S. air attacks were already making Kiska too hot for the enemy. As a follow on, because of the static condition in the North Pacific, Admiral Theobald agreed to release cruisers for Guadalcanal. By 1 December 1942 his force consisted of two light cruisers: *Raleigh* and *Detroit*, four destroyers and a few torpedo boats.⁵⁴

Americans Move West to Amchitka

As noted earlier the Eleventh Air Force was back in the air by 31 December 1942. The operational record for the fall and winter months had shown improvement over that of the summer, primarily because of the addition of Adak as an airbase. Operations still required favorable weather. Establishing the airfield on Adak did not solve the problems caused by the weather. Missions continued to be grounded by

the weather at either the airfield or the target. The Americans needed a field even closer to Kiska, to exploit breaks in the weather. Admiral Theobald initiated the move to take Amchitka in November. The JCS formally directed the invasion with D-Day "as near as possible to 5 January 1943" after surveys indicated there were suitable airfield possibilities.

The decision to take Amchitka was also not free from inter-service bickering, and Admiral Nimitz decided Admiral Theobald was unable to perform optimally since he could not get along with sister services.⁵⁵ Admiral Theobald was relieved by Rear Admiral Thomas C. Kinkaid on 4 January as Commander Task Force 8. For the record, Cruiser-Destroyer Strike Group Commander Admiral Smith was relieved by Rear Admiral Charles H. McMorris, 9 December 1942.

In preparation for the Amchitka landing, the Eleventh Air Force made a series of heavy strikes. The air plan included Adak and Umnak bombers striking Japanese naval forces and shipping at Kiska and specific targets as designated by Admiral Kinkaid. The plan also called for daily reconnaissance of Attu. From D-Day forward, the Eleventh Fighter Command was to maintain continuous daylight coverage at Amchitka with four or more fighters. Because of the weather, there was, once again, a minimum of planned air operations; a few P-38s over Amchitka and no strikes at Kiska by the heavy bombers.⁵⁶

The target landing date for Amchitka, 5 January, had to be postponed because of the weather. By 12 January, the weather had slackened enough for the landing. The weather conditions were far from ideal, and the Amchitka landing proved costly. *USS Worden* braved the high seas of Constantine Harbor, Amchitka, to put the scouts ashore. As *Worden* made her way out of the harbor she was swept onto a pinnacle rock and punctured her hull. *Dewey* was unsuccessful in attempts to tow her clear. Abandon ship was ordered, and 14 men died in the icy waters before they could be rescued, *Worden* was a complete loss.⁵⁷

The weather continued to worsen throughout the 12th and 13th. On the 13th, Army transport *Middleton* went aground spilling its fuel which washed up on shore adding to the miserable conditions experienced by the personnel unloading the barges. The transport *Reardon* was also swept onto rocks and later sank.⁵⁸ Nevertheless Brigadier General Lloyd E. Jones, USA led the landing force on to Amchitka. Admiral McMorris' force; *Indianapolis*, *Raleigh*, *Detroit* and four destroyers provided close support. Amchitka was uninhabited and the landing was unopposed.

Amchitka was the logical choice for the Americans. It was located about 70 miles, less than an hour's flying time, to the east of Kiska making it ideal for responding to breaks in the weather. The island was less than 200 miles west of Adak. This location facilitated planning for round-

the-clock bombing in preparation for an invasion of Kiska. If the Americans could open an airbase on Amchitka, there could be little doubt that the Japanese on Kiska and Attu were doomed.

Once ashore the men were used as pack mules, the mud was too deep for vehicles.

The most difficult thing to do in Amchitka was to live...because of mud conditions...the path was never the same...The mud shifts on Amchitka, and a hunk of ground passable in the morning is a bottomless swamp in the afternoon.⁵⁹

Along with the mud was the wind and snow, but there was no time to wait for the weather to clear. The Japanese could be expected as soon as the weather let up. As anticipated, on 23 January, the Japanese send a reconnaissance flight over the island. On the following day the Japanese began a series of minor attacks on Amchitka which ran into February. These attacks were usually futile, consisting of two float planes, with little or no damage sustained by the Americans.⁶⁰

On 25 January construction began on the runway. Again the engineers performed a near miracle; draining a lake and filling the lake bottom with dirt for the foundation for the runway. The first Warhawk fighters landed 16 February. There were no air operations on the 17th because of stormy conditions. Zeros made their routine fair-weather attack on the 18th. This time the two Zeros

were downed by the Warhawks. Japanese light bombing ceased.⁶¹

The American inventory of aircraft on Amchitka continued to grow. As the bombing campaign was accelerated and air reconnaissance was improved the Japanese soon found their supply problems unsolvable.

The construction of the airfield on Amchitka permitted the Americans to use single engine fighters which previously were ineffective because of the long distances and unpredictable weather. At times, after Amchitka was opened, there were 13 and 14 missions per day. Though the occupation of Amchitka did not produce immediate spectacular results, it did help make the Japanese hold on the Aleutians weaker. The growing American air power bombed Kiska and Japanese shipping whenever the weather allowed. The incomplete enemy air strips on Kiska and Attu were prime targets. The American's situation had improved markedly from the days of missions flown from Umnak, when long flights were scheduled without information about the weather to the west.

The Americans were in position to begin the final assault on the Japanese positions in the Aleutians. The Japanese must choose to either evacuate the Aleutians or strengthen their positions. The Japanese faced a dilemma of the already strained shipping depleted by U.S. submarines throughout the Pacific theater and the Guadalcanal campaign.

To evacuate the Aleutians would leave the Kurils open to American attack. On 5 February, Imperial Headquarters decided "to hold the western Aleutians at all costs and to carry out preparations for war" in the Kurils.⁶²

Without heavy equipment and under constant harassment by U.S. forces, the Japanese were unable to complete an airstrip on either Kiska or Attu. The Americans, with land-based aircraft, held overwhelming air superiority; the payoff for fighting mud, wind and snow on Adak and Amchitka to complete the air fields.

Americans Tighten the Grip

American forces prepared for the final push to force the Japanese out of the Aleutians. Admiral Kinkaid ordered more air strikes and sent Admiral McMorris' force to cover the approaches from Japan to Attu and Kiska. The decision was also made to weaken enemy positions at Holtz Bay and Chichagof Harbor, Attu. Admiral McMorris divided his task force. The anti-shipping patrol composed of heavy cruiser *Indianapolis*, and destroyers *Coghlan* and *Gillespie* formed a scouting line about 120 miles southwest of Attu. The remainder of the task force: light cruiser *Richmond* and destroyers *Bancroft* and *Caldwell*, were dispatched for the planned bombardment of Attu.⁶³

The anti-shipping patrol engaged and sank the *Akagane Maru*, loaded with munitions, on 18 February. Two other Japanese Army transports escaped detection by the

Americans, but they returned to Japan without discharging their passengers or cargoes.⁶⁴

D-Day for the bombardment of Attu was tentatively set for 21 February, with H-Hour 15 minutes before sunrise. The plan was to target Holtz Bay first and Chichagof Harbor second. Any ships present would automatically become the primary target for the cruisers. The shelling was actually carried out on the 18th of February. Conditions were favorable: winds from the northeast at 12 knots, seas smooth and visibility excellent. The shelling was conducted without enemy air opposition, or sea or shore batteries although there was some anti-aircraft fire against the spotting planes. Again, no conclusive results were observed.⁶⁵

Through March 1943, air operations were increased, with 39 raids conducted against Kiska. April operations were interrupted for five days by a storm packing winds up to 108 miles-per-hour. By 21 April, Kiska had been attacked 83 times and by the end of the month 640 tons of bombs had been dropped.⁶⁶ The Eleventh Air Force and the Navy Catalinas continued to increase the tempo of attrition. The Japanese, who were trying to complete airstrips on Kiska and Attu, were bombed and strafed six or seven times per day. The Japanese were in critical need of more men and equipment. Admiral Hosogaya, who had successfully run the American blockade earlier, would have to try again. On 22

March Admiral Hosogaya departed Paramushiro with two heavy cruisers, two light cruisers, four destroyers and three transports destined for Attu.⁶⁷

Battle of the Komandorskis

Admiral McMorris initiated further patrols west of Attu. Following analysis of previous routes chosen by the Japanese, he established a patrol area encompassing the northwesterly approaches to the island. His reorganized force, Task Group 16.6, consisted of heavy cruiser *Salt Lake City*, his flagship, light cruiser *Richmond* and four destroyers; *Bailey*, *Coghlan*, *Dale* and *Monaghan*. Task Group 16.6 was patrolling on 26 March with winds from the southeast at 7-8 kts, seas were calm with swells from the northeast and surface visibility excellent. There was a heavy overcast, with a ceiling at 4,000-5,000 feet.⁶⁸

What followed would be a three and one-half hour, daylight naval gunfire battle between McMorris' Task Group 16.6 and Admiral Hosogaya's force attempting to reach Attu. The details of the battle will not be outlined here except to point out how the Aleutian weather played a role in the event.

The battle was strange for several reasons. It took place on a rare stormless day on the edge of the Bering Sea. Japanese ships, faster and with greater firepower, were unable to close the Americans. Neither side employed land-based air power. Finally, following nearly constant

gunfire for almost four hours from ranges of 8-12 miles few sailors were killed or wounded and there was only minor damage to the ships. All ships on both sides were operational at the battle's end.

About 0730 the Americans made radar contact with the enemy force of undetermined size and strength. Admiral McMorris radioed the information and his intent to attack back to Admiral Kinkaid by 0800. Quickly it became evident to McMorris that the Japanese held the advantage with better tactical position, greater numerical strength and overwhelmingly superior firepower. Eight of the Japanese ships engaged the Americans: two heavy cruisers to one, two light cruisers to one, and four destroyers to four.⁶⁹

The battle took place in an area 40-80 miles south of the island of Medni, the easternmost Komandorski Island, about half way between Attu and the Kamchatka Peninsula. The Japanese base at Paramushiro was approximately 500 miles away and the American base at Adak was about 600 miles away. Though the American bombers were promptly notified they did not engage in the battle or catch the transports. McMorris was told he could not expect the bombers until about 1430, but the Catalinas might arrive before that time.⁷⁰

A brilliant surface battle ensued. At one point during the battle *Salt Lake City* was damaged to the point of being dead in the water (DIW), yet skill or luck prevailed and the Japanese failed to strike a killing blow. The

battle was over by 1205 after the Japanese mysteriously turned away from the American ships. Two questions come out of the battle: Why did Hosogaya break off and return to Japan? Where was the American air power? The Aleutian weather was intertwined in both.

Various explanations were offered for the Japanese retirement. Excuses for Hosogaya's actions include fuel supply or ammunition below minimums prescribed by doctrine. Evidently, Hosogaya was unaware that *Salt Lake City* had gone DIW, or he feared an impending American air attack.⁷¹ American air support should have been on the scene by this time.

At one point during the later stages of the battle *Salt Lake City's* turret III ran out of AP. Before it could be resupplied, turret III fired HE projectiles. The use of these bombardment shells may have confused the enemy into thinking they had come under air attack. The Japanese heavy cruisers were noted firing an anti-aircraft barrage into the overcast.⁷² Regardless of why he broke off the attack, Admiral Hosogaya was relieved within a month.

The absence of American air power was just as mysterious. At 0840 Admiral Kinkaid ordered two PBYs on a routine patrol to make contact with the *Marus* that were being escorted by Hosogaya. They did not find them until 1410. The PBYs were not carrying bombs and their contact reports were late and poor.⁷³ A strike force of three B-25s

and eight P-38s departed from Amchitka at 1330. They were delayed when it became necessary to install extra fuel tanks in each. Though the strike force had received reports from McMorris on where to find the Marus, it had to return to base before locating the targets because of lack of fuel.⁷⁴

Bombers at Adak had been loaded with GP bombs for a planned attack on Kiska. The ground crews had to remove the GP and get AP. The AP was frozen to the ground, and valuable time was spent getting them unstuck. Four hours were lost for the bomb change. By the time the bombers were uploaded, a storm had blown in, and Adak was socked in for two hours. Six hours later the Liberators were airborne, but Hosogaya's force was well out of range.

Following this incident six B-25s were kept on anti-shipping alert.⁷⁵ Regardless of how it happened, the Americans had successfully turned back a superior enemy force escorting transports, preventing reinforcements of personnel or material from reaching Kiska or Attu. The last transport known to have run the blockade had reached Attu on 10 March. The Japanese defenses on the islands were in serious trouble.

Prelude to American Invasion

Admiral Kinkaid ordered a second naval bombardment of Attu which was carried out 25 April. By the end of April, Adak had become the center of U.S. operations in the Aleutians. American forces on Adak numbered 19,067 Army and

7,811 Navy personnel. American forces on Amchitka had grown to 10,260 Army and 903 Navy personnel. Air power from these two bases had assumed significant proportions.⁷⁶

The end of April found many Japanese buildings of Kiska's main camp area and part of the submarine base destroyed as a result of 1,000 sorties by American planes. During May Americans flew 35 strikes in 22 days: 17 over Kiska, 17 over Attu and 1 on the Rat Islands. 470 tons of bombs were dropped on Kiska and Attu. Twenty-eight planes were lost, but only three were known to have been destroyed by enemy action.⁷⁷

Summary

It was believed after the Battle of the Komandorskis that no other enemy ships, except submarines, ran the blockade. American forces were now geared up to continue the movement westward. The Americans had patiently built bases closer and closer to Kiska and Attu. The American engineer effort was critical during this phase of the campaign to overcome the obstacle presented by the harsh Aleutian weather. The ability of the Americans to establish airbases closer to the enemy gave them overwhelming air supremacy. The Americans had land-based aircraft within an hour of the enemy. Whenever the weather was clear, the Americans could immediately respond and launch a formidable attack.

Even with this operational advantage, the weather continued to interfere with all operations on the tactical level. On the tactical level, neither side was able to sustain attacks serious enough to drive their opponent from their holdings.

CHAPTER 6

AMERICAN INVASIONS OF ATTU AND KISKA

To this point in the campaign the principal players had been the air and naval forces. The American invasions of Attu and Kiska highlight the conditions experienced by the ground forces fighting in the Aleutians, in addition to the effect of the weather on the planned coordinated operations.

After the Americans occupied Amchitka, it was only a matter of time before the air force and naval blockade cut the Japanese garrisons off from further supply. All of the P-38s had been moved out to Amchitka, and on 1 May, Eleventh Bomber Command established its advance command post there.¹ For the first ten days of May a total of 155 tons of bombs were dropped on Kiska and 95 tons on Attu. The next four days' operations were cancelled because of weather. These missions hindered enemy efforts to improve their defenses, but did little as a softening-up program.² Photography gained from these flights provided the only intelligence on enemy installations and order of battle.

Admiral McMorris, following the Battle of the Komandorskis, kept the pressure on the enemy by continuing his patrols in the western Aleutians. The American victory

off the Komandorskis had lost the Attu garrison's last hope for reinforcement. On 10 April the Japanese tried another run at the islands with two destroyers. The ships were spotted and bombed by PBY search planes. The ships returned directly to Paramushiro.³

Advance planning for an invasion to eject the enemy had focused on Kiska first. Such an operation would require more shipping, equipment, and manpower than the JCS were willing to expend in the Aleutians. The JCS advised Admiral Kinkaid and General DeWitt, that they could plan and train, but they would not be taking Kiska in the near future.⁴

From air reconnaissance and observations made during bombardments, Admiral Kinkaid inferred that Attu, with no airfield, no coast defense guns and sparse anti-aircraft weapons, would be a softer target to hit than Kiska. A plan was submitted to substitute Attu as the next target. Planners assumed only a small force would be required, much of which was already present in the Aleutians. Admiral Nimitz obtained JCS approval and set the date for the invasion of Attu as 7 May 1943.

The invasion was set for May in hopes of completing the operation before the foggiest time of year set in.⁵ Also, by taking Attu first, the stronger garrison on Kiska

would be further isolated. Included in the plan to invade Attu was a plan to occupy Shemya and build an airfield to further close the grip on Kiska.⁶

It was January, 1943, when President Roosevelt and Prime Minister Churchill met in Casablanca and discussed Allied strategy. The Joint Army-Navy planning staff for the Attu invasion had already assembled in San Diego and the 7th Infantry Division was undergoing amphibious training at Fort Ord. The plans for the invasion of the Aleutians were not discussed at Casablanca for fear the British would misinterpret American conviction to Europe first.⁷ This was further indication the Aleutians were considered only a secondary or even tertiary theater and support for missions in the area would remain limited.

Americans Poised for Invasion of Attu

A platoon leader interviewed following the action on Attu summed up the events that were to come:

On many occasions, actuality will differ greatly from preoccupied ideas. Plans will go wrong, mistakes will be made, weather conditions will change, the terrain may be different than anticipated, enemy actions may be confusing. Such was the situation on Attu.⁸

The intelligence staffs of Admiral Kinkaid and General Butler had limited information about the enemy; aerial photography, visual sighting and radio intercepts. The Americans did not understand the terrain or fully comprehend the effects of the weather.⁹ Attu had muskeg, a

decayed vegetation that makes a soft mud when not frozen, below the tundra. The tundra will support a heavy tractor with narrow treads for only one pass over it. It will support a light tractor with wide treads for an indefinite number of passes. Tundra will support only the lightest tired vehicles.¹⁰

One last hinderance to any American plan was the lack of adequate maps. Prior to the Japanese occupation of the island there had never been a detailed study of the interior. The geodetic survey maps that existed contained little information on the terrain beyond the shoreline.¹¹

By May 1943, Americans were still beginners in executing amphibious warfare. Operations to that time, in particular the Battle of the Komandorskis, had demonstrated that tactical air support in the Aleutians was as uncertain as the weather. A gale, complete with blinding snow, during the passage to Attu, or a sudden williwaw through a mountain gorge as the boats advanced to the landing, could have broken up an invasion before it ever got started.¹² However, air and naval bombardments had not been able to drive the Japanese out of the Aleutians. To remove the enemy required ground combat.

Attu: The Plan

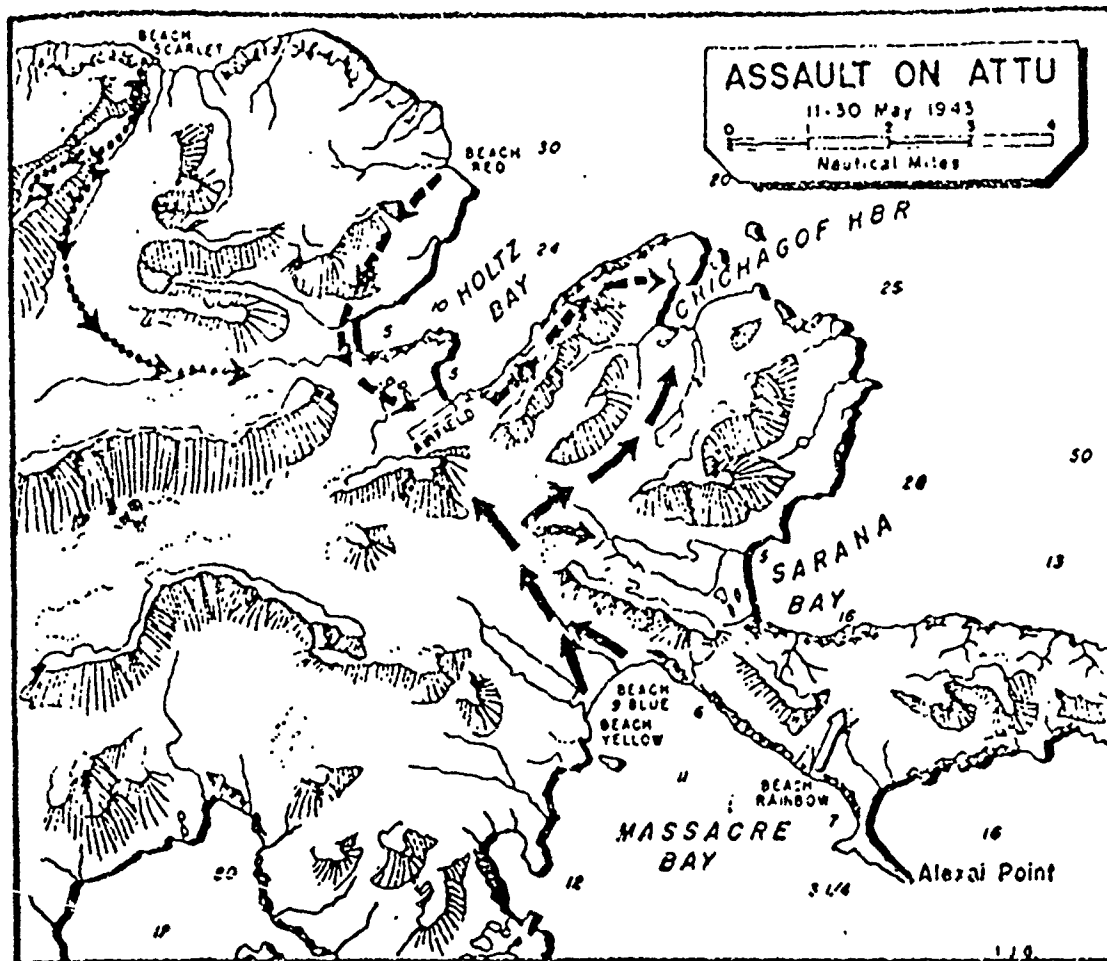
Admiral Kinkaid published his Operation Order 1-43, 21 April 1943; the overall plan for Operation LANDCRAB. Task Force 51 was to include battleships *Pennsylvania*, *Idaho* and

Nevada; escort carrier *Nassau*; destroyers *Aylwin*, *Edwards*, *Hall*, *Macdonough*, *Meade*, *Monaghan*, *Phelps*, *Dale*, *Dewey* and *Farragut*; and destroyer/minesweepers *Sicard* and *Pruitt*.¹³

Field Order 10, dated 25 April, detailed the plan for Eleventh Air Force participation. The Shore Based Air Group was divided into two units. The Air Strike Unit, the Eleventh Air Force under the command of General Butler, consisted of twenty-four heavy and thirty medium bombers and 128 fighters. The second unit, the Air Search Unit was Patrol Wing 4, under the command of Captain Gehres, with his twenty-four PV-Is, thirty PBY-5As and 5 seaplane tenders.¹⁴

The mission of the Shore Based Air Group for the 10 days preceding D-Day was to intercept and destroy shipping, photograph BOODLE (Kiska) and JACKBOOT (Attu), and harass enemy garrisons. The group had the mission of destroying key installations beginning D-minus 5 and destroy enemy air forces.¹⁵ The carrier-based planes were to provide cover and observation for the landing forces and ship-based planes were designated to provide spotting for naval gunfire.¹⁶

The Japanese garrison on Attu was estimated at 2,200 men. It was also believed that no enemy ships had reached the garrison since the Battle of the Komandorskis, leaving the enemy outnumbered and on half-rations,¹⁷ although the Japanese had established a base and worked on an airstrip at Holtz Bay. See figure 5. The plan called for two major landings: one on the northern side of the



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Figure 5

island near Holtz Bay, and the other on the southern side of the island, at Massacre Bay.¹⁸ See figure 5. Rear Admiral Francis W. Rockwell, Commander Amphibious Force North Pacific, and the 7th ID which had been training in Nevada for a desert operation, began amphibious practice at Fort Ord. The California conditions were as unlike Attu as could be found. The resulting clash between these troops and the weather produced valuable lessons learned.

The Attu Invasion Begins

The landing force, commanded by Major General A. E. Brown, USA, was composed of the 7th Infantry Division, 17th Infantry reinforced; one battalion 32nd Infantry, reinforced; 78th Coast Artillery AA; one battalion 50th Engineers; and a scout company and a reconnaissance troop. It departed from San Francisco under extreme "cloak and dagger" measures to keep their destination a secret.

The assault force arrived in Cold Bay on 30 April. Originally scheduled to depart for Attu on 3 May, the force was delayed one day by weather: D-Day was reset for 8 May. By 7 May, as the 29 ship assault force approached Attu, surf conditions appeared too unfavorable, D-Day was again postponed 24 hours to 9 May. On 8 May the weather was so foul and seas so high that D-Day was postponed again to the 11th and the task force retired to a position about 150 miles north of Attu to fuel. Weather, as usual, upset the American timetable.¹⁹

The landing finally took place on 11 May, though conditions were far from ideal. Dense fog still blanketed the area. In the History of United States Naval Operations in World War II, Samuel Morison states:

For the invader, treacherous currents, uncharted rocks and almost continuous fog promised trouble. The old Arctic navigator's rule was never to approach nearer the land after you began to hear the bark of sea lions, but these ships had to close to perform their missions.²⁰

The dense fog concealed the assault ships from enemy air and submarine interference. Americans had radar which was supposed to prevent collisions as the formation shifted from cruising to approach. The maneuver required an interchange of all ships between transports and battleship groups in addition to formation changes within each. The ships fought through the pea-soup fog for hours. *Sicard*, distrusting her surface search radar, followed in the wake of the ship ahead of her then had to resort to stopwatch and maneuvering board to maintain station. *Macdonough*, while changing course to confirm the movements of the transports was rammed by the *Sicard*. Though there were no injuries suffered and both ships made port safely, their absence from the invasion was noticed; *Sicard*, with its radar, was to have been the control vessel for the landing at Massacre Bay and *Macdonough* had been given a special fire control mission.²¹

The two landing areas were separated by about thirty miles. Northern area landings in the vicinity of

Holtz Bay, though under dense fog instead of the forecasted clear skies, were uneventful. No direct gunfire support of these landings was possible because of the visibility conditions. *Pennsylvania* and *Idaho* did bombard Chichagof Harbor for about one hour in the morning to neutralize enemy batteries. This fire was radar controlled and was only partially effective because of the lack of visual observation and spotting.²² Planes from *Nassau* were able to fly a strike against Holtz Bay before the fog closed in.²³

Day two; *Nassau* and Army bombers continued to strike both arms of Holtz Bay. The *Pennsylvania*, *Idaho* and *Phelps* bombarded enemy anti-aircraft positions.²⁴

On day three the Army planned to attack in force, but fog once again blanketed the area and enemy anti-aircraft guns laid down fire on Red Beach.

Day four was the American attempt to breakthrough to the west shore of Holtz Bay. Weather prevented air support. The *Pennsylvania* continued to fire away at Holtz Bay and Chichagof Harbor from ranges of 13,000-15,000 yards. After two and one-half hours of steady shelling, the *Pennsylvania* had expended all 14-inch high capacity (HC) ammunition. *Pennsylvania* closed and delivered 600 more rounds of 5-inch, before securing for the day and, as it turned out, for the campaign.²⁵

On day five the American soldiers made the breakthrough as came down out of the fog toward Holtz Bay

so rapidly that the Japanese left stores and weapons in place as they retired to Chichagof Harbor for a final stand. By day seven Holtz Bay had been cleared of the enemy. Americans had discovered the fog and darkness provided them with opportunities to surprise the dug in Japanese.²⁶

The southern landing at Massacre Bay did not progress as well as the Holtz Bay landing. The southern assault was hampered not only by zero visibility delaying the landing, but by vague charts of foul areas. With the loss of *Sicard*, *Pruitt*, without SC radar, had to be conned in by *Dewey*. The fog prevented *Pruitt* from tracking the landing boats in more than 300-400 yards.²⁷ A platoon leader landing on Attu describes the activity:

D-day had been set for May 7th, but due to weather conditions (fog and high seas) we did not make our landing until May 11th. H hour had been set for 0740 but in hopes that the fog would lift, we waited until nearly 1600 before going in. When we did go in, the limit of visibility was about 600-800 yards. As the result of this low visibility, most of the wave commanders and coxswains got lost on the trip in, and the second wave landed first. However, the second, the first and the third waves all landed on the beach at approximately the same time. Nearly a hundred boats were jammed together a hundred yards off shore for about a half-hour until it was decided to go on in for the landing. Then the first three waves were all jammed together on the beach.²⁸

Once ashore the worst natural obstacles were the muskeg and the underlying mud which all but prevented movement of trucks and tractors.²⁹ Progress in the south was so poor, 4,000 yards in 48 hours, that Admiral Kinkaid decided to relieve General Brown as ground force commander.

On day six Major General Landrum, USA assumed command of ground forces.³⁰

Conditions Faced by Ground Troops

Though the ground action will not be detailed in this account the conditions experienced by the troops will be examined. Trench foot was the worst enemy of the ground troops. Their leather boots got wet, and they had to stand in the snow all day. The wet feet became the same as frost-bitten feet. There were several names for the ailment: immersion foot, trench foot and frost-bite. The results were the same, the soldiers could not walk, their feet were frozen.³¹

A platoon leader offers the following clothing suggestions:

Troops fighting in this area should have the proper clothes. The lumberman's boot that we wore is about useless. It is not waterproof no matter what you do to it. We should have a shoe much like the Alaska Defense Command has. The Japs have one almost exactly like it. The rain pants and jacket are excellent. However, we wore them wrong side out, because moisture condenses on the rubber inner lining and keeps the wearer constantly wet. The rubber clothes need pockets...The Alaska Field Jacket is fine. We should be issued wool helmets that cover the neck. Our necks were always wet and cold. Everything in the matter of clothes should be considered on the basis of keeping dry. No matter what is done, a soldier will never keep completely dry, but we were too wet, especially our necks and feet...Our RLG [Regimental Landing Group] lost many effectives as exposure cases.³²

The wet conditions also adversely affected the soldiers' equipment. For example the radios did not work.

In response to complaints from troops who fought on Attu, the Army gave the following advise:

...it has been found that the Radio Set SCR-536, in common with most field radio sets, requires special preparation for use in rain or amphibious operations...Precautions during use. In rain, turn top side down when extending or collapsing antenna. Wipe antenna as dry as possible while collapsing.³³

This was hardly advice that could be properly applied in the Aleutian theater, where thick fog and/or rain are in the air almost constantly. Not only unable to communicate with each other, the soldiers on the ground were virtually blinded by the fog. They were unable to see who was firing at them or who they were firing at. In summary, the ground troops were ill-prepared for action on Attu and found the weather and terrain as formidable an enemy as the Japanese.

Air Support for Attu Invasion

Weather frustrated aerial activity for both the Army and Navy on every day of the operation. In particular, at no time could Nassau launch an all-out attack. Rarely could more than four planes operate efficiently against an enemy position. It was not advisable for Nassau to have more than eight planes in the air at one time should a sudden shift in the weather prevent recovery. The loss of only five pilots was considered low, in view of the lack of training, the nature of the operation and the weather.³⁴

On D-Day, May 11, Nassau was unable to provide close air support for the landing force because of 0-2,000 ft. ceilings. Army planes were limited to occasional observations, reporting the progress of units, and dropping supplies to them.³⁵ There was little improvement to the conditions on the 12th as reflected by limited air support.

Fog had delayed follow-on landings at Massacre Bay until the 13th. Weather was too adverse for observation flights or direct support missions for these landings.³⁶ On the 14th, at the urgent request of ground forces at Massacre Bay, Nassau launched a strike against southern targets. Two flights of four Wildcats were launched, but the weather was too severe. The williwaws snatched the planes as they flew up the valleys beneath the overcast and four planes and three pilots were lost.³⁷

One flight each of Army B-25s and B-24s reached Massacre Bay. The B-25s were unable to drop their bombs because of the weather conditions. The B-24s were able to make a bombing run at the East Arm of Holtz Bay. One B-24 dropped provisions to forward elements in the south before it crashed into a mountain pass.³⁸ The weather on 14 May prevented air support.

Low ceilings characterized 15 and 16 May. The attacks scheduled for the morning were delayed by the usual poor visibility. There were no carrier operations on the 15th. An Army B-24 was able to get through and drop

supplies on the 15th. In the afternoon of the 15th a flight of P-38s arrived, simultaneous with a break in the weather over Attu and were able to deliver an effective attack on enemy forces in the north.³⁹ On the 16th, three flights of Army bombers and two flights of P-38s reached Holtz Bay, but weather prevented the bombers from making their run, while the P-38s were able to come in under the overcast to bomb and strafe targets.⁴⁰

Naval gunfire support for the operation was also hindered by the poor visibility conditions. On 14 May *Pennsylvania* fired almost continuously for two and one-half hours. The poor visibility required the use of radar to position the ship for firing.⁴¹ Captain Corn, Commanding Officer *USS Pennsylvania* commented: "The SG radar is essential for combatant ships operating in the Aleutian area. The SG radar (PFI) installed on the navigation bridge was invaluable."⁴² Foul weather, the nature of the terrain and the preparation of the Japanese defenses caused the fire support force to expend large quantities of ammunition to neutralize enemy positions. This raised two issues. First, the enemy positions were not destroyed; when the firing ceased the Japanese would return to firing against American ground troops.⁴³ Second, the expenditure of such large amounts of ammunition might have handicapped American ships if the Japanese had been able to develop naval opposition.⁴⁴

After the ships had exhausted their bombardment ammunition they had to return to Adak to replenish with the *Shasta*.⁴⁵

Japanese Response

Vice Admiral Kawase relieved Admiral Hosogaya. Kawase received word from Tokyo that Attu, not Kiska was to be the target for the Americans. He decided to wait until late May before attempting to reinforce his forces in the Aleutians. By that time daily fog could be expected to hide his movements, and Japanese transports would be outfitted with radar equipment.⁴⁶ Admiral Kawase, in Paramushiro, lacked an adequate force to take on the Americans. He diverted three transport submarines to Kiska and departed in the heavy cruiser *Maya* with destroyer *Usugumo* to join the *Kimikawa Maru* convoy already enroute Kiska. Land-based bombers and *Kimikawa's* planes were directed to attack American transports.⁴⁷

Admiral Koga, the new Commander in Chief of the Combined Fleet, assigned heavy cruisers *Myoko* and *Haguro* to Admiral Kawase. He also ordered air and submarine strength be augmented in the North Pacific. On 16 and 17 May Admiral Koga in his flagship, *Musashi*, accompanied by smaller battleships *Kongo* and *Haruna*; carrier *Hiyo*; cruisers *Tone* and *Chikuma*; and five destroyers sailed from Truk, for Tokyo before continuing to the north. The ships arrived in Tokyo on the 21st and 22nd. These ships were to join carriers *Zuikaku*, *Shokaku* and *Zuiho*; heavy cruisers *Mogami*, *Suzuya*

and *Kumano*; light cruisers *Agano* and *Oyodo*; eleven destroyers and suitable logistic support.

This force assembled in Tokyo too late to help Colonel Yamazaki on Attu. Also unfortunately for the Japanese, assembling this force in Tokyo indirectly afforded the Americans an unopposed landing at Rendova in the Solomons Islands in late June.⁴⁸

Colonel Yamazaki had only 2,630 men on hand to defend Attu. He had inadequate defense installations with only twelve anti-aircraft positions and a few coastal defense guns. His force was so small, it would have been ineffective to divide his force to defend all the possible landing beaches. He opted for a delaying action and blockaded the valley connecting Holtz Bay with Massacre Bay. Knowing he was outnumbered, Yamazaki ordered all secret documents destroyed and prepared for Attu to cost the Americans dearly.⁴⁹

Fog became the enemy of the Japanese. Admiral Kawase was unable to intercept the American invaders. Twenty torpedo boats departed from Paramushiro 13 May, but were forced to turn back because of weather. The *Kimikawa Maru* was unable to fly her planes to interdict the Americans. Finally, with word that American battleships and cruisers were operating in the vicinity of Attu, Admiral Kawase did not want to bring his own cruisers closer than 400 miles and encounter the Americans.⁵⁰

The first Japanese air reaction to the American operation on Attu came on 22 May. The Japanese conducted a torpedo and strafing attack against the *Charleston* and *Phelps*, patrolling off Holtz Bay, coming out of a fog that the Americans considered "no fly" weather. A similar attack was conducted on the 23rd. This was the extent of the response the Japanese were able to muster.⁵¹

In fighting on the ground from 19 May to 25 May, Yamazaki retreated to the ridge between Chichagof Harbor and Sarana Bay. On the 27th Americans dropped leaflets inviting the Japanese to surrender.⁵² At 0330, 29 May, Yamazaki directed his remaining force of 800 men on one of the biggest banzai charges of the war.⁵³ The result was the deadly end of organized resistance on Attu.

Lessons and Costs of Attu

The American invasion of Attu was only the third amphibious operation of the war. The numbers of the operation are: 2,351 Japanese killed and 28 taken prisoner; 600 Americans killed, 1,200 wounded and 2,100 non-combat casualties out of a landing force of over 11,000.⁵⁴ Limited air operations resulted in the following losses: 7 Navy planes and 5 pilots, Eleventh AAF lost 3 planes and 11 men.⁵⁵

The importance of this phase of the campaign is it demonstrated how weather minimized the advantages of overwhelming air superiority. The invasion had evolved into

a hard fought infantry battle. When supported by air attacks and artillery, ground forces were able to make gains; without the fire support they were pinned down. As summed up in the Office of Naval Intelligence combat narrative; "The entire operation was thus modified, like every phase of the Aleutian Campaign, by the variability of weather condition and the prevalence of fog and wind."⁵⁶

Aftermath of Attu Invasion

Following the Japanese suicide charge on the 29th the Americans commenced work on an airstrip on Attu. American forces also and conducted an unopposed landing on Shemya, 35 miles to the east of Attu, and commenced construction of an airstrip on that island as well. The Shemya airstrip was completed by 21 June.⁵⁷

Army engineers on Attu were able to do more in one month than the Japanese were able to do in the eleven months they held the island. Immediately roads were built and foundations laid for buildings. Most important, the Americans chose a different site than the Japanese for the airstrip on Attu. Work started on the 29 May at a spot on the east side of Massacre Bay and the first planes landed on Attu on 8 June.⁵⁸

Kiska was now vulnerable from both sides. No longer could cargo ships coming east simply use the cover of a storm to evade the Americans. The two new airstrips also

gave the Americans a base from which bombers could strike the Kurils.

Attention Returns to Kiska

The plan for taking Kiska was ready before the fall of Attu. It was obvious from the Attu experience that extensive training needed to take place before a second invasion should be attempted. The target date for the invasion was set for 15 August. The Kiska invasion was to be on a larger scale than Attu because the Japanese garrison on the island was estimated to be between 7,000 and 8,000 men.⁵⁹ Planners were also determined not to commit the same mistakes.

Attu invasion forces had trained in the desert and were sent to the Aleutians in clothing totally inadequate for combat in the region, resulting in more casualties from frozen feet than from enemy action.⁶⁰ For the Kiska invasion the North Pacific Amphibious Force conducted realistic training rehearsals north of the 50th parallel. Adak was the focal point for training.⁶¹ The men experienced the Aleutians; slogged through the muskeg and became acclimatized to the weather. The troops were also issued the proper combat wear for the Aleutians, in particular rubber shoe-pacs.⁶²

Kinkaid Turns Up the Heat

Shortly after the fall of Attu, Admiral Kinkaid established a destroyer blockade of Kiska. He ordered the island bombed several times per day, weather permitting.⁶³ Bombers from the new American runway at Alexai Point on Attu were on anti-shipping alert and were within striking distance of the northernmost of the Kurils, as well as Kiska. The Army pilots seemed to solve the fog problem by letting Navy Venturas equipped with special radar guide them to the targets. From 1 June to 15 August, 1,454 sorties were flown and 1,255 tons of bombs were dropped on Kiska.⁶⁴ The Eleventh Army Air Force had been reinforced from an average of 292 planes on hand in June, 352 in July, to 359 in August (an all time high.)⁶⁵

On 22 July the Navy and AAF combined for a colossal bombardment of the island. Two Navy task groups were employed. Rear Admiral Robert M. Griffin's Task Group Gilbert included: two battleships, *Mississippi* and *New Mexico*; one cruiser *Portland*; and four destroyers, *Abner Read*, *Farragut*, *Monaghan*, and *Perry*. Rear Admiral Robert C. Giffen commanded Task Group George: heavy cruisers, *Louisville*, *San Francisco*, and *Wichita*; light cruiser *Santa Fe*; and five destroyers, *Aylwin*, *Bache*, *Hughes*, *Morris* and *Mustin*.⁶⁶

Weather in the area was unusually clear, the bombardment proceeded as planned. Admiral Griffin targeted

Kiska Harbor while Admiral Giffen targeted Little Kiska Island, South head and Gertrude Cove. The ships expended 212 tons of HE on the targets.⁶⁷ Up to eighty Army planes conducted bombing and strafing attacks both before and after the 20 minute naval bombardment. The Army planes experienced intense and accurate flak.⁶⁸

The Navy conducted several other bombardments of Kiska throughout July in support of the harassment effort. Naval gunfire was usually conducted by one or two of the destroyers expending from 100-200 rounds. Little to no return fire was experienced, and there was no conclusive evidence of significant damage being inflicted on the enemy.⁶⁹ These night raids had little more than a nuisance value. The combined 22 July bombardment was by far the largest and was probably considered by the Japanese on Kiska to be the prelude to an American invasion.⁷⁰

The 4th of August marked the climax of the air offensive against Kiska. Most of the returning crews reported only light and inaccurate anti-aircraft fire. Bomb Damage Reports from photos of 27 July through 4 August revealed no attempt by the Japanese to fill craters in the runway; all the trucks were in identical positions; and there were ten to twelve fewer barges than usual in the harbor.⁷¹ Suspicions were rising that the Japanese had evacuated the island. On 12 August the Navy Task Group conducts its last pre-invasion bombardment. From 10 August

through D-Day the Eleventh AAF dropped 355 tons of bombs on Kiska.

15 August, Troops Go Ashore

The landing force numbered over 34,000 troops (5,300 Canadian.)⁷² The initial assault parties made no contact with enemy forces. American planes were grounded at Shemya and Amchitka. Kiska was completely blanketed in fog. Landings for D-plus one went according to schedule, again without air support because of combat planes being weathered in.⁷³ Fortunately, no air cooperation was needed.

The Kiska air campaign ended on D-plus two when a single Liberator from Shemya with the air coordinator reconnoitered visible areas on Kiska, this was the last mission flown in August.⁷⁴

Japanese Evacuate

There were no Japanese forces on Kiska. Air and sea bombardments had made it all but impossible to live and work on the island, and the threat of overwhelming defeat was looming in the near future. Skillful use of the weather conditions played a key role in the Japanese evacuation from Kiska.

It is now known that Vice Admiral Akiyama issued the order to evacuate Kiska on 8 June.⁷⁵ The Japanese used I-subbs, large transport submarines, to evacuate the first 700 men. This method proved to be too slow and hazardous.

The mission was assigned to surface ships.⁷⁶ Admiral Kawase planned a run into Kiska under cover of the summer fog. His plan was opposed by Catalinas conducting air search, surface patrol forces, Army planes bombing the Kurils, the destroyer blockade and the naval bombardment of Kiska.

Admiral Kawase waited in Paramushiro for an opportunity to make his dash for Kiska. Attempts were begun as early as 10 July but were turned back when the weather did not prove to be thick enough.⁷⁷ Finally, on 21 July, Kawase departed Paramushiro for Kiska.

On 27 July the Japanese force ran for Kiska under the clouds and fog, unloaded the garrison of 7,000 men in two hours, and returned to Paramushiro by 31 July.⁷⁸ More than good luck had favored Admiral Kawase. His patience in waiting for perfect weather paid off when the fog did not lift.

But, where were the American destroyers? A final twist to the Aleutian Campaign was "The Battle of the Pips." The phantom battle cleared the way for the Japanese force to complete its mission to Kiska.

"The Battle of the Pips"

On 23 July, Catalinas reported radar contact on seven vessels 200 miles southwest of Attu. Admirals Griffin and Giffen were covering the approaches to Kiska. Aylwin and Monaghan, blockading Kiska, were called off station to form up about 80 miles southwest of Kiska. The plan was to

intercept the seven ships. Surprisingly the weather was clear.

Just after midnight on the 26th, *Mississippi* reported a radar contact; *Idaho*, *Wichita* and *Portland* all claimed similar radar contacts. Six minutes later the battleships and cruisers opened fire. After about 30 minutes cease fire was ordered and the radar screens were clear. The battleships had fired 518 14-inch shells, and the cruisers had spent 487 8-inch rounds.

At dawn the ships circled back and launched a spotter plane. Nothing was found in the area; no ships, no wreckage, no debris. It appeared the contacts were return echoes from nearby mountains. The Americans retired to refuel with *Pecos* 105 miles south-southeast of Kiska. The island was left wide open for the evacuation operation.⁷⁹ Like the AAF, the Navy resumed the bombardment of Kiska after the enemy had departed.

American Invasion Will Proceed

Evidence was mounting that in fact the Japanese had evacuated the island. As mentioned previously, trucks were not dispersed; there was only one barge in the harbor; radio Kiska had been off the air since 28 July; coastal defense guns did not fire at the destroyers; there was no anti-aircraft fire; and the positions appeared to be abandoned. Major General Holland M. Smith, USMC requested scouts be sent ahead to assess the situation.

Admiral Kinkaid decided the Kiska operation would proceed without the use of scouts. By 17 August the troops reached the enemy's main camp area and found the signs of the evacuation. From 18-22 August they continued to search for the enemy. None was found.⁸⁰ The only gunfire associated with the landing was a brief skirmish between American forces who were unable to identify each other in the dense fog. Twenty-six Americans were killed.⁸¹

The departure of the Japanese from Kiska ended the Aleutian Campaign, but the battle against the weather continued. The Eleventh AAF was now in position to conduct raids against the Kurils.

Summary

The weather proved to be an important factor at the tactical level for this final phase of the Aleutian Campaign. Weather interfered with coordinated operations, rendering air and naval support for ground troops unreliable. On the operational level, the Americans were able to overcome the weather and mass overwhelming combat power to overcome the Japanese. The Americans were able to isolate the enemy and ultimately defeat them.

CHAPTER 7

CONCLUSIONS AND RECOMMENDATIONS

The Aleutian Campaign concluded with the American occupation of Kiska in August 1943. The Japanese had been driven out of Attu and Kiska, and the bombers of the Eleventh Air Force were in position for strikes against the Japanese Kuril Islands. The threat to the U.S. northern flank posed by the Japanese presence in the Aleutians had been removed. Attacking Dutch Harbor and holding Kiska and Attu became a liability for the Japanese. Their carriers and ships could have been better employed at Midway. As the campaign continued, the troops, supplies, cargo ships and escort devoted to the Aleutians were needed by the Japanese at Guadalcanal.¹

Conclusions

The purpose of this study was to examine historical data to determine if climatological factors played a decisive role in the air, land and sea battles of the Aleutian Campaign of World War II. To determine if weather was the decisive factor of the campaign the following subproblems were examined. First, what are the climatological conditions of the North Pacific and Aleutian

Islands? Second, did the weather conditions affect operations in all arenas of battle; air, sea and ground? Third, how did the U.S. forces overcome these conditions to drive the Japanese out of the Aleutians? Finally, were the climatological factors decisive?

Chapter Four described the weather conditions in the Aleutians. No other theater in the war experienced such miserable conditions. The nearly constant rain, drizzle and fog, combined with the incessant and often powerful winds, played a major, detrimental role in daily operations. All areas of battle were affected by the weather on the tactical level.

Air operations were hampered by the persistent overcast conditions from the initial attack at Dutch Harbor to the final bomb runs over Kiska. Land-based aircraft of the Eleventh Army Air Force and patrol planes of the Navy's Patrol Wing Four were unable to locate and attack either the Japanese fleet responsible for the 3-4 June 1942 attack on Dutch Harbor or the final evacuation fleet.

The months preceding the invasion of Attu found air operations dependent on the weather. From bases in the eastern Aleutians the Americans ran a hit-or-miss air campaign to bomb the Japanese off Kiska and Attu. Special techniques to deliver the bombs were developed. Planes flew missions in generally dangerous conditions of low visibility, high winds and icing.

During the war, the Eleventh Air Force flew over 3,600 sorties and dropped more than 7 million pounds of bombs.² Navy PBVs and Venturas flew 704 combat sorties and thousands of patrols in the Alaska theater. Navy aircraft dropped 295 tons of bombs.³ Aircraft lost by the Eleventh Air Force, Fleet Air Wing 4, the Royal Canadian Air Force, and other air units in the Aleutians totaled 225, of which only 41 were combat losses. Those classified as operational losses were caused primarily by accidents (see figure 6). Weather was the prime culprit in those accidents.

Allied Aircraft Losses for Aleutian Campaign

AIRCRAFT	COMBAT LOSSES	OPERATIONAL LOSSES	TOTAL
Fighters	18	108	126
Lt Bomber	0	2	2
Med Bomber	7	18	25
Hvy Bomber	10	22	32
Patrol	5	34	39
Float	1	0	1
Totals	41	184	225

Figure 6⁴

The uncertainty of daily flight operations disrupted mission planning. Hours of flight time were often wasted as the planes arrived over Kiska only to find the target obscured by fog. Moving the bases westward did not solve the American's problems. Planes operating from Adak

and Amchitka could still arrive to find the target overcast. In addition they had to maintain enough fuel in reserve to return to bases in the east in the event Adak and Amchitka were weathered in. All of this could and did occur after favorable weather at the operational airbase allowed for the mission to take-off.

A third problem directly related to the weather was bomb damage assessment. Throughout this study I noted that accurate assessments of air and naval bombardments were inconclusive. Frequently spotting planes and photographic reconnaissance planes found targets obscured by the overcast. Without a means to measure bombing effectiveness it was impossible to conduct mission planning and determine targets for follow-on operations. Bombardment operations were not effective enough to adequately destroy enemy installations or drive the Japanese out of the Aleutians.

Two basic operations conducted from the sea were bombardments of the Japanese on Kiska and Attu, and blockade operations to prevent resupply and reinforcement of the Japanese garrisons. The weather affected our feeble naval bombardment efforts. Usually unable to see the targets because of excessive range and/or overcast, naval forces found it difficult to be effective. Spotting aircraft were either unable to launch or found themselves in the clouds, unable to send back reliable reports. It became evident

that these bombardments did little to destroy Japanese installations on either island.

American efforts to blockade the region were often stymied by the storms which generally tracked west-to-east. The Japanese successfully hid in a storm front to evade the U.S. forces to conduct the initial strikes on Dutch Harbor and continued to use that tactic throughout the campaign. In the end the Japanese again successfully used the weather conditions to execute the evacuation from Kiska. It was not until the aggressive blockade efforts of Admiral McMorris, further west, that the Americans began to interdict the Japanese supply efforts. Taking Attu and Shemya placed American bases west of Kiska and left the Japanese ships no place to hide.

For the ground soldier the weather made living and fighting conditions miserable. The casualty figures for the Attu invasion had more non-battle casualties than wounded. For the foot soldier, the mud and weather conditions were as much an enemy as the Japanese. The weather also had an indirect affect on the ground troops. By preventing aerial and naval bombardments to support the ground action on Attu, the weather reduced the invasion to a very hard fought ground battle.

Examining the three phases of the campaign revealed that weather, though a dominant factor at the tactical level, was not the decisive factor. For example, during the

Japanese attack on Dutch Harbor, effective communication between Dutch Harbor and the American air assets at Cold Bay and Otter Point could have produced an air attack against the Japanese fleet. An effective attack against the Japanese fleet in the North Pacific in combination with the Japanese defeat at Midway may have discouraged Japanese interest in the Aleutians in June of 1942.

During the period following the Japanese occupation of Kiska and Attu, and before the American invasion of Attu, weather was again a dominant factor at the tactical level. Activity by both sides was hindered by the weather. The air and sea operations designed to blast the Japanese out of the Aleutians could not be conducted with the frequency or intensity necessary to accomplish the task.

The Americans were able to overcome the limitations imposed by the weather by establishing airfields closer to the enemy. The American engineers and soldiers constructed runways and bases on Adak and Amchitka before the enemy was able to complete similar projects on either Attu or Kiska. These airfields gave the Americans the ability to employ land-based aircraft and subsequent overwhelming air superiority. American ingenuity and resolve were decisive during this phase of the campaign. American air superiority sealed the fate of the Japanese in the Aleutians.

Finally, the inability of the Japanese to reinforce and resupply the Aleutian garrisons left them vulnerable to

defeat. The Americans brought their land-based aircraft into forward positions and threatened Japanese shipping. Admiral McMorris' blockade successfully turned back Japanese resupply efforts leaving the garrison on Attu undermanned and on half rations. The Americans simply invested more men and equipment to the theater than the Japanese did.

During the Aleutian Campaign, fewer than 10,000 Japanese troops, a few ships and seaplanes had tied up a much larger American force. By August of 1943, over 100,000 American troops, a sizable naval task force and the Eleventh Army Air Force with its Canadian allies had engaged the enemy and the elements for over a year.⁵

The weather conditions in the Aleutian theater were the worst of World War II and undoubtedly were a dominant factor in all operations. Air, sea and ground operations were all affected by the weather. No operation was executed as planned; planes were grounded, naval bombardments were cancelled and landings were postponed, all because of the weather. Nonetheless, weather was not the decisive factor at the tactical level. Ingenuity, sheer numbers and the ability to mass combat power were the factors which ultimately led to the American victory in the theater.

Recommendations

Further research is necessary to resolve the hypothesis on the strategic level warfare. Planning at the strategic level outlines the intentions of political and

military leaders. Did either side intended to invade the other via the Aleutian Islands? L the harsh weather conditions and subsequent chaotic effect on coordination and planning preclude consideration of the Aleutians as the invasion route? It is quite likely the Japanese never intended to invade mainland North America. The Japanese plans for June 1942, did not include an invasion of Dutch Harbor but, merely the bombing of the facilities. It has been postulated the Japanese occupied Kiska and Attu as a blocking action against the possibility of an American invasion.

Another motive for Japanese operations may have been to tie up American forces in the Aleutian theater. Was it the intention of the Japanese to execute economy of force operations in the north to influence operations in the south?

The Japanese may not have had the industrial might to carry on campaigns in both the North and South Pacific. Further study focused on the Japanese use heavy equipment to construct their defenses and airfields should reveal the priority the Japanese placed on each theater. Lack of heavy equipment support to the garrisons on either Kiska or Attu prevented any realistic expectation that an airfield would be completed. Without such an airfield the Japanese could not mount a serious threat in the North Pacific.

This study did not detail American pre-war preparedness in the Aleutians. Future study of the level of preparedness for war would show how serious the Americans were about protecting the area for their own use and how much they feared a threat to the mainland via this route.

After the Japanese had been forced from the region, the Americans did not further exploit these bases for an invasion of Japan. By the summer of 1944, the war had moved from Alaska. In August 1944, the War Department ordered a cutback of Army and Army Air Force troops in Alaska. The Army's strength of 150,000 was quickly reduced to 50,000 and airbases west of Adak were scaled back.⁶ These reductions ruled out continuous missions against Paramushiro and follow-on operations against Japanese home islands.⁷

The Aleutian Campaign had demonstrated the difficulty of planning and executing operations in the region without interference from the weather. No strategic offensive along the Aleutians was attempted by either side. Further research is required to determine if weather eliminated the Aleutians from becoming the primary invasion route for either the Americans or Japanese.

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